

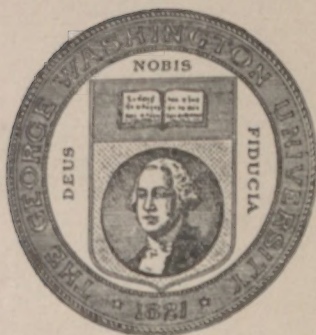
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CONVOCATION NUMBER

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BULLETIN

VOL. IX

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THE WINTER CONVOCATION.

The Winter Convocation was held Tuesday, February 22, 1910, at 10.30, at the Belasco Theater. The auditorium was draped with American flags and the stage was tastefully arranged with the buff and blue banners of the University and the stars and stripes. Members of the faculties, board of trustees, and their guests, including distinguished men, and a large body of the students, gathered to honor those who were to receive their diplomas, and in honor of George Washington, whose birthday it was and whose name is borne by the University. Among those who had seats on the stage were Justices Harlan and Brewer, of the United States Supreme Court, Chief Justice Shepard, and Justices Robb and Van Orsdel of the District Court of Appeals, Chief Justice Clabaugh, and Justices Anderson, Wright, Gould, Barnard, and Stafford of the District Supreme Court.

The academic procession gathered at the University at 10 o'clock and marched to the theater. Seats had been reserved in the center of the theater for the students and on the sides and in the boxes were the guests of the University. The Rev. U. G. B. Pierce, Chaplain of the United States Senate, offered the invocation. An orchestra from the United States Marine Band, under the leadership of Lieutenant William Santelman, played a number of patriotic selections. Before he presented Attorney-General Wickersham, who delivered the address of the day, President Needham said: "It is a great pleasure to welcome you here. This Winter Convocation of the George Washington University serves a double purpose. It permits us to honor the students who have successfully completed their courses of study, and serves as a memorial to the great man whose name this University bears.

"The law stands for strength and government. Some persons doubt that the law has made progress, but progress comes slowly, like wisdom. No one is better able to speak on the progress of law than that distinguished lawyer, the Attorney-General of the United States."

Address of the Attorney-General:

THE PROGRESS OF LAW.

It is related by Herodotus that after the deposition of the usurper who seized the throne of Cambyses, King of Persia, the three leaders of the successful movement debated as to the form of a permanent government for that country. Otanes, who contended for a democracy, finding himself in the minority, proposed to yield his preferences to the other two on condition that neither Megabyzus nor Darius should reign over him or any of his posterity, which, being assented to, he made no further opposition to the establishment of a monarchy, and the historian adds:

"At the present period this is the only family in Persia which retains its liberty, for all that is required of them is not to transgress the laws of the country." (Herodotus, Beloe's translation, Book 3, p. 165.)

This conception of liberty under law, usually regarded as the product of northern independence of character, and by many as peculiarly an Anglo-Saxon inheritance, thus appears to be of much greater antiquity, and although often obscured, sometimes for prolonged periods, it has ever recurred as the highest ideal of civilized human society.

Herodotus does not explain to us in what respect the liberty guaranteed to Otanes and his descendants differed from that of the other inhabitants of Persia, for it will be observed he considers that the family of Otanes enjoyed liberty because all that was required of them was that they should not transgress the laws of the country; but as he does state that the first act of Darius, after he was proclaimed king, was to divide Persia into twenty provinces, and to fix an amount of annual tribute which each was to pay to him, it would seem that the historian meant to indicate a distinction between government and law and to imply that while subject to the law, the favored family was relieved from the burdens of government.

Mr. James C. Carter, in his work on "Law and its Origin," maintains:

"that while Legislation is a command of the Sovereign, the unwritten Law, is not a command at all; that it is not a dictate of Force, but an emanation from Order; that it is that form of conduct which social action necessarily exhibits, something which men can neither enact nor repeal, and which advances and becomes perfect *pari passu* with the advance and improvement of society" (pp. 344-5).

Mr. Carter was a profound student of the English common law, and a strong believer in the value of customary or common law as opposed to statute law, considering that those customary rules of conduct which are the result of the moral consciousness and progressive thought of a people afford a better working basis for the government of a civilized state than do rules of conduct prescribed by legislative authority. It is the function of the judges, he says:

"to watchfully observe the developing moral thought, and catch the indications of improvement in customary conduct, and enlarge and refine correspondingly the legal rules. In this way, step by step, the great fabrics of common law and equity law have been built up without the aid of legislation, and the process is still going on" (p. 329).

Yet he recognized the necessity for the employment of legislative action, or what he calls "the conscious agency of society," in the improvement of the law in its application to the constantly developing and increasingly complex forms of modern existence, insisting, however, that the sole function both of law and of legislation is "to secure to each individual the utmost liberty which he can enjoy consistently with the preservation of the like liberty to all others," adding that every abridgment of liberty demands an excuse, and that its only good excuse is the necessity of preserving it (p. 337).

It is the acknowledged duty of all good citizens to obey the law, be that law written or unwritten. The unwritten law, representing as it does a generally prevailing public conception of right action, must necessarily command the readiest obedience; statutory laws too frequently embody the ill-considered view of a moment; the expression of a temporary emotion, or the successful determination of a portion of the community to impose their will upon the remainder. The sound growth and development of the written law must follow and make more specific and more readily enforcible the principles of unwritten law, or it becomes an instrument of dissatisfaction and even of oppression. Yet no progress in the improvement of laws is realized through either evasion of or organized opposition to the laws of a self-governing people. As Washington said in his farewell address:

"The very idea of the power and the right of the people to establish government presupposes the duty of every individual to obey the established government.

"All obstructions to the execution of the laws, all combinations and associations under whatever plausible character, with the real design to direct, control, counteract, or awe the regular deliberation and action of the constituted authorities, are destructive of this fundamental principle and of fatal tendency. * * *

"However combinations or associations of the above description may now and then answer popular ends, they are likely in the course of time and things to become potent engines by which cunning, ambitious, and unprincipled men will be enabled to subvert the power of the people, and to usurp for themselves the reigns of government, destroying afterwards the very engines which have lifted them to unjust dominion." (Messages and Papers, Vol. I, p. 218.)

The history of every civilized state presents many points of resemblance with that of every other. Primitive communities are bound

together more or less loosely, dependent upon the need of union for common defence against some external enemy. As civilization progresses a necessity arises for rules to govern the action of the individuals in the community towards each other, more than to protect the group against the aggressions of other groups; and as communities become more populous, and civilization more complex, rules of conduct must needs be increasingly minute and specific; but the fundamental principle guiding all successful civilization must be to preserve in as large a measure as is consistent with the welfare of the whole freedom of action in the individual. In monarchical countries this freedom is menaced more from the head of the state than from other individuals in it. Under democratic governments, the individual requires more protection against other individuals or groups of individuals than from the government; yet the abuse of monarchical power has often resulted in the same injury to the welfare of individuals which is occasioned by abuse of the power which under democratic institutions individuals or groups of individuals may acquire over others.

Queen Elizabeth of England, between the sixteenth and forty-third years of her reign, partly for the purpose of raising revenue, and partly to reward her favorite, granted a very large number of patents conferring upon their holders the exclusive privilege or monopoly for designated periods of time to manufacture, sell, or deal in specified articles of commerce. The injury to the community caused by these special privileges became so great as finally to produce a most remarkable and spontaneous outbreak among the people both in and out of parliament, which led to a complete and absolute disavowal by the Queen of any intention to afflict her subjects, the cancellation of the greater part of these patents, and the submission to the judgment of the courts of law of the validity of the remainder. The odious character of these monopolies in the view of the English people of that day is vividly depicted in the debates of the day. The list of the objects of the monopolies was truly appalling. They embraced the exclusive right to deal in such articles as iron, powder, cards, leather, cloth, ashes, vinegar, sea coals, steel, brushes, saltpetre, and many others. One Dr. Bennet, during a discussion in parliament is recorded as saying:

"In respect of a grievance out of the City for which I come, I think my self bound to speak that now which I had not intended to speak before; I mean a Monopoly of Salt. It is an old Proverb *Sal sapit omnia*; Fire and Water are not more necessary. But for other Monopolies of cards (at which word Sir Walter Raleigh blusht), Dice, Starch and the like, they are (because Monopolies) I must confess very hurtful, though not all alike hurtful. I know there is a great difference in them; And I think if the abuses in this Monopoly of Salt were particularized, this would walk in the fore rank."

He was followed by another member who severely criticised the monopoly in tin. This brought Sir Walter Raleigh to his feet. He could have contented himself with blushes concerning cards, but the attack on the Tin Monopoly compelled him to speak. The arguments he resorted to in its defence have become familiar to later generations.

"When the Tinn is taken out of the Mine, and melted and refined," he said, "then is every piece containing one hundred weight sealed with the Duke's Seal. Now I will tell you, that before the granting of my Patent, whether Tinn were but of seventeen shillings and so upward to fifty shillings a hundred, yet the Poor Workmen never had above two shillings the week, finding themselves: But since my Patent, whosoever will work, may; and buy Tinn at what price soever, they have four shillings a week truly paid. There is no Poor that will work there, but may, and have that wages. Notwithstanding," he declared, evidently perceiving that the argument fell upon deaf ears, "if all others may be repealed, I will give my consent as freely as to the cancelling of this, as any Member of this House." (D'Ewes, Journals of the Parliaments, pp. 645-6.)

Elizabeth was no less shrewd than Raleigh in perceiving the temper of the time, and with a clear perception that the public conscience was against her, she disclaimed all purpose of afflicting her subjects, declared she had acted upon bad advice, and authorized her minister, Cecil, to declare to the House that:

"There are no Patents now of force, which shall not presently be revoked; for what Patent soever is granted, there shall be left to the overthrow of that Patent, a Liberty agreeable to the Law. There is no Patent if it be *Malum in se*, but the Queen was ill apprized in her Grant. But all to the generality be unacceptable. I take it, there is no Patent whereof the Execution hath not been injurious. Would that they had never been granted. I hope there shall never be more, (All the house said *Amen.*)" (id., p. 652).

Therefore, declared Cecil:

"there shall be a Proclamation general throughout the Realm to notify her Majesties resolution in this behalf. And because you may eat your meat more favourly than you have done, every man shall have Salt as good cheap as he can either buy it or make it, freely without danger of that Patent, which shall be presently revoked. * * * And they that have weak Stomachs, for their satisfaction, shall have Vinegar and Alegar, and the like set at liberty. Train Oyl shall go the same way; Oyl of Blubber shall march in equal rank; Brushes and Bottles endure the like Judgment. * * * Those that desire to go sprucely in their Ruffs may at less charge than accustomed obtain their wish; for the Patent for Starch, which hath so much been prosecuted, shall now be repealed" (p. 652).

In the year following these debates in the great case of the monopolies, it was held by the Court of Queen's Bench that a patent granted by Queen Elizabeth, to Ralph Bowes, Esq., conferring on him the sole and exclusive right to make and sell playing cards within the realm for a term of years, was utterly void for two reasons: (1) that it was a monopoly and against common law; (2) that it was against divers acts of parliament. It was against common law because:

"1. All trades, as well mechanical as others, which prevent idleness (the bane of the commonwealth) and exercise men and youth in labour, for the maintenance of themselves and their families, and for the increase of their substance, to serve the Queen when occasion shall require, are profitable for the commonwealth, and therefore the grant to the plaintiff to have the sole making of them is against the common law, and the benefit and liberty of the subject."

"2. The sole trade of any mechanical artifice, or any other monopoly, is not only a damage and prejudice to those who exercise the same trade, but also to all other subjects, for the end of all these monopolies is for the private gain of the patentees; and although provisions and cautions are added to moderate them, yet * * * it is mere folly to think that there is any measure in mischief or wickedness: and, therefore, there are three inseparable incidents to every monopoly against the commonwealth, *sc.* 1. That the price of the same commodity will be raised, for he who has the sole selling of any commodity, may and will make the price as he pleases. * * * The 2d incident to a monopoly is, that after the monopoly granted, the commodity is not so good and merchantable as it was before: for the patentee having the sole trade, regards only his private benefit, and not the common wealth. 3 It tends to the impoverishment of divers artificers and others, who before, by the labour of their hands in their art or trade, had maintained themselves and their families, who now will of necessity be constrained to live in idleness and beggary * * *

"3. The Queen was deceived in her grant; for the Queen, as by the preamble appears, intended it to be for the weal public, and it will be employed for the private gain of the patentee, and for the prejudice of the weal public; . . . " ((11 Coke's Reports, 84b.)

The principles of this great decision have been recognized as immutable in all later discussions of the subject in the law of England or America. All subsequent statutes against monopolies in England and America depend for their reason on the principles so clearly and so quaintly set forth in this judgment. In the development of our modern civilization, with our boundless natural wealth and our unexampled facilities of transportation and communication, by individual effort working through the machinery of compact organization, the people of the United States twenty years ago found themselves confronted with

conditions strongly resembling those which aroused the people of England and their representatives in parliament to the point of revolt against even so beloved a sovereign as their Virgin Queen. These conditions, however, unlike those of 1601, were not wholly occasioned by sovereign grant, although they were in large measure the result of the abuses of grants by sovereign power of corporate existence and the facilities of corporate organization. No such comprehensive control over any one of the great industries which were dominated by those large aggregations of capital called "trusts," could have been attained but through the exercise of powers granted by the sovereign states, and the condition, therefore, was strongly analogous to that which arose in the reign of Elizabeth. True, this form of control had not yet resulted in that absolute power which the patentees of Elizabeth possessed over the sale of salt, vinegar, and the like. But mindful that "Eternal vigilance is the price of liberty," and to employ Webster's immortal phrase, "While actual suffering was yet afar off," we, like our ancestors of revolutionary days, raised our arms by the peaceful method of legislation against a power which we perceived rising cloud-like on our economic horizon. We saw the rapid concentration of power over our great industries in a few hands, a power which no free state can long suffer to endure; the power of fixing prices at will, determining the amount of production, dictating the terms on which thousands of our fellow countrymen might pursue their means of livelihood; the power to exclude or permit competition; all the elements of those monopolies which so stirred the generation of Englishmen from whom the Pilgrim Fathers came. The problem was complicated by the dual nature of our government. Concerted action by the states was impracticable, it may be said, impossible. Efforts at control by one state were evaded first by removing to another; then by the device of holding corporations. Therefore the evil could not be met merely through the development and application of the unwritten law, although its principles clearly established the unlawfulness of all monopolies. Some means had to be found through the exercise of national power to check the continued concentration of the control of the great industrial life of the country.

In this instance, as in so many others in our national history, there was found in the simple but comprehensive charter of our national government, the basis for a solution of this problem, and the prevention of the further growth of these great abuses by the exercise of what Mr. Carter called "the conscious agency of society" speaking through the national legislature. In the power conferred upon the Congress to regulate trade and commerce among the states and with foreign nations, there was discovered a weapon adequate to the need; and the simple, comprehensive enactment that all contracts and combinations which put a restraint upon interstate or foreign commerce should be unlawful, and

that the Federal Courts might enjoin them, placed in the hands of the national judiciary the power to stem the rising tide of monopoly. The underlying principle in this legislation is the preservation of the right of the individual to carry on trade and commerce free from undue control and restraint on the part of great aggregations of individuals or capital; in a word, to protect the individual from the tyranny of a group. In the development of civilization, after four hundred years, in a new world, the same menace to free institutions had arisen which has recurred from time to time in earlier civilizations, and by the application of the principles of liberty, based upon the fundamental conceptions expressed by the ancient Persian and regarded by Herodotus, there was found an effective bulwark for the prevention of a people from industrial slavery. Well might Washington say as he did in his farewell message:

"To the efficacy and permanency of your union a government for the whole is indispensable. * * * Sensible of this momentous truth, you have improved upon your first essay by the adoption of a Constitution of Government better calculated than your former for an intimate union and for the efficacious management of your common concerns. This Government, the offspring of our own choice, uninfluenced and unawed, adopted upon full investigation and mature deliberation, completely free in its principles, in the distribution of its powers, uniting security with energy, and containing within itself a provision for its own amendment, has a just claim to your confidence and your support. Respect for its authority, compliance with its laws, acquiescence in its measures, are duties enjoined by the fundamental maxims of true liberty."

The need and the purpose of our federal constitution have never been more comprehensively and accurately stated than in Washington's declaration of its object in the paragraph just read: "for an intimate union and for the efficacious management of your common concerns."

It is because of the increase in the number and character of our common concerns that we are turning more and more to the source of national power for the principles which permit of its application to new evils as they arise, and to the extension of benefits and advantages which are of common concern to all; not merely to a particular state or locality.

The framers of the constitution were thoroughly imbued with the principles of the common law, and they understood the language of the law. In expressing the grant of power which they agreed upon to the new federal government they were possessed by no pedantic love of minute accuracy. On the contrary, they employed the broadest and most comprehensive language possible to use to express the principles which they were formulating, thus leaving unfettered the application of those principles to the manifold and changing phases which future growth and development might make essential to the preservation of the

fundamental object of the union: to provide "for the efficacious management" of "the common concerns" of the whole country.

Very shrewdly were these great powers devolved upon the national government. Hamilton answered the objection that they would tend to render the government of the union too powerful in the Seventeenth Paper in the "Federalist."

Speaking of the principle embodied in the constitution of legislating for the individual citizens rather than for the states, and adverting to the objection that such principles would tend to make the union too powerful and enable it "to absorb those residuary authorities which it might be judged proper to leave with the states for local purposes," he said:

"Allowing the utmost latitude to the love of power which any reasonable man can require, I confess I am at a loss to discover what temptation the persons entrusted with the administration of the general government could ever feel to divest the states of the authorities of that description. The regulation of the mere domestic police of a state appears to me to hold out slender allurements to ambition."

Hamilton's mind was ever imperial.

"Commerce," he continued, "finance, negotiation and war seem to comprehend all the objects which have charms for minds governed by that passion; and all the powers necessary to those objects ought in the first instance to be lodged in the national depository."

And so there they were lodged by the charter of our indissoluble union; and to them, as our need bids, we turn for the effective vehicles of the progressive development of a great and free country; whose laws must be adequate to cope with every problem which the restless ambition of man can invent, to the end that this land may ever display a signal example of

"Liberty and Union
Now and forever
One and inseparable."

CONFERRING OF DEGREES.

Degrees in course were conferred by the President of the University upon the following candidates:

Dean McBain, of the College of the Political Sciences, presented,

For Bachelor of Arts:

OSCAR HENRY WILLIAM CARLSON, Pennsylvania.

COE ALOYSIUS MCKENNA, Oregon.

SILAS WESLEY ROGERS, Arkansas.

LL.B., 1906, University of Arkansas.

Dean Vance, of the Department of Law, presented,

For Bachelor of Laws:

WILLIAM McDOWELL BIRNEY, District of Columbia.

WALTER CLAYTON CARPENTER, Rhode Island.

Ph.B., 1906, Brown University.

HEATH SUTHERLAND, Connecticut.

As of the Class of 1890.

Dean Munroe, of the Faculty of Graduate Studies, presented,

For Civil Engineer:

RAYMOND EDMOND ADAMS, Pennsylvania.

B.S. in C.E., 1909, the George Washington University.

For Master of Arts:

ALICE MAUD BARBOUR, Connecticut.

B.S., 1893, Wellesley College.

WESLEY FROST, Kentucky.

A.B., 1907, Oberlin College.

THEODORE CUSHING HAMM, California.

B.A., 1904, University of Colorado.

BUTLER BLACK HARE, South Carolina.

A.B., 1899, Newberry College.

At the conclusion of the exercises the audience joined in singing America.

REGISTRATION OF STUDENTS, MARCH 21, 1910.

Graduate Studies	87
College of Arts and Sciences.....	302
College of Engineering and Mechanic Arts.....	180
College of Political Sciences	64
Teachers College	85
Division of Architecture.....	72
Department of Law.....	329
Department of Medicine.....	116
Department of Dentistry.....	27
College of Pharmacy.....	87
College of Veterinary Medicine.....	51
Total	1400

TITLES OF BOOKS, MONOGRAPHS, PAPERS, ETC., PUBLISHED BY
MEMBERS OF THE FACULTIES SINCE DECEMBER, 1909.

- ABBOT, HENRY LARCOM, U.S.A., LL.D., Professor of Hydraulic Engineering (1905-).
Half Century of a West Point Class, 1850 to 1854. Printed for private distribution, 1906.
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Projects of the Board of Consulting Engineers. Engineering Magazine, July, 1906.
Hydrology of the Chagres River. George Washington University Bulletin, Vol. V, No. 4, December, 1906.
Rainfall and Outflow above Bohio, Valley of the Chagres. Monthly Weather Review, February, 1907.
Problems of the Panama Canal. New York: Macmillan Co., Second Edition, February, 1907. 260 pp.
Preparatory Period of the Panama Canal. Harvard Engineering Journal, June, 1907.
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Progressive Climatic Variations on the Isthmus of Panama. Monthly Weather Review, June, 1908.
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The Oregon War of 1855. Journal, Military Service Institution, November, 1909.
San Francisco in 1855. Journal, Military Service Institution, January, 1910.
Dimensions of an Artificial Waterway to Carry a Known Volume. In press: Professional Memoirs, Engineer Bureau.
- BARTSCH, PAUL, PH.D., Professor of Zoölogy (1898-),
Review of "Wild Wings: Adventures of a Camera Hunter among the Larger Wild Birds of North America on Land and Sea," by H. K. Job. The Nation, Vol. 81, No. 2095, p. 171, August, 1905.
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- Review of "Flashlight in the Jungle: A Record of Huntings, Adventures and of Studies in Wild Life in Equatorial Africa," by C. C. Shillings. *The Nation*, Vol. 82, No. 2122, pp. 183-184, March, 1906.
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- Application of the Thermodynamic Formulas to the Non-Adiabatic Atmosphere. M. W. R., March, 1906.
- Numerical Computations in the Vertical Co-ordinate. M. W. R., June, 1906.
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- The Cottage City Waterspout, August 19, 1896. M. W. R., August, 1906.
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- Continued. M. W. R., December, 1906.
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*To be appointed.

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In June, 1898, an ordinance was adopted by the Board of Trustees formally establishing as a separate department of the University the Department of Jurisprudence and Diplomacy. This Department was opened on November 15, 1898.

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SEPARATE COURSES FOR ALL-DAY AND AFTERNOON STUDENTS.

Since 1903 the work of the Law School has gradually been transferred from the late afternoon hours to the forenoon, and at the present time the lectures offered to all-day students are largely confined to the earlier part of the day.

To meet the needs of those students whose employment in the Government service, or elsewhere, prevents their attendance before 4.30 in the afternoon, an afternoon course is given.

HOURS FOR LECTURES.

In the all-day course a large part of the instruction is given between the hours of 9.00 a. m. and 1.00 p. m.

In the afternoon course the instruction is given between the hours of 4.50 and 6.30 p. m.

LOCATION.

All classes in the Department of Law are held in the Law Building, situated on H street, adjoining the main University building, at the corner of Fifteenth street. This hall, dedicated on January 3, 1890, was

especially designed for the work of this Department. It is commodious and well equipped with lecture-rooms, Moot Court rooms and offices, and contains the law library, with a conference-room adjoining.

ACADEMIC YEAR.

The academic year extends through more than eight months, beginning on the last Wednesday in September and ending on the second Wednesday in June, and is divided into two half-years, the second half-year beginning on the first day of February. The session of 1910-11 begins on Wednesday, September 28, and closes Wednesday, June 7. Since many of the courses given during the first half-year are completed before the beginning of the second half-year, it is possible for a student to enter on the 1st of February of any year and be graduated three years from that date, receiving his degree at the Winter Convocation, held on February 22, of each year.

Lectures begin promptly on the first day of the term, and students applying for admission at a later day will be admitted only upon showing good cause for the delay and by special action of the Faculty.

ADMISSION.

1. FOR THE DEGREE OF BACHELOR OF LAWS.

Applicants for admission as candidates for the degree of Bachelor of Laws must be at least eighteen years of age and must have had educational training sufficient to satisfy the entrance requirements of the Department of Arts and Sciences of the University. In order to satisfy these requirements, which are set out at length in the General Catalogue of the University, students must present credits aggregating 15 units, which are broadly equivalent to a four years' high school course. Applicants for admission on certificate should secure formal certificates setting forth the credits claimed, and present these certificates attached to their application forms. All applications for admission should be addressed to the Secretary of the Department of Law, who will, upon request, furnish proper blanks and detailed information as to entrance examinations.

2. FOR THE DEGREE OF MASTER OF LAWS.

Candidates for the degree of Master of Laws must be at least twenty-one years of age and hold the degree of Bachelor of Laws from an institution substantially complying with the requirements of the Association of American Law Schools, of which this school is a member.

3. FOR THE DEGREE OF MASTER OF PATENT LAW.

Only those students who are graduates of an approved law school or members of the bar in good standing will be admitted as candidates for the degree of Master of Patent Law.

4. FOR THE DEGREE OF DOCTOR OF JURISPRUDENCE.

No student will be admitted as a candidate for the degree of Doctor of Jurisprudence unless he shall hold a baccalaureate degree conferred by some institution of approved standing after the completion of a liberal course of undergraduate academic study, and possess a reading knowledge of Latin, French, and German. At the discretion of the Faculty, however, other languages may be substituted when the character of the work undertaken is such as to warrant it. The right is reserved to the Faculty of Graduate Studies to decide in all cases whether the applicant has given sufficient evidence that his antecedent training fulfills these requirements. In addition, the candidate must hold the degree of Bachelor of Laws from this University or from some other institution requiring equivalent work as a prerequisite to that degree.

5. SPECIAL STUDENTS.

Persons who for any reason do not qualify as candidates for a degree may, on the recommendation of the Faculty and with the assent of the professors whose courses they elect to take, be admitted as special students.

ADVANCED STANDING.

Students may be admitted to advanced standing in the second or third year classes upon satisfying the requirements for the work of the preceding year or years. These requirements may be met by presenting certificates from other law schools of accredited standing showing that the student has successfully completed equivalent courses, or by passing the regular examinations set for that purpose at the beginning of the term, after the student has shown that he has pursued a course of study in the subjects upon which he is examined, covering at least as many hours as are required for such subjects in this University.

All examinations that may be required of applicants for advanced standing are held during the first week of each session.

METHOD OF INSTRUCTION.

Instruction in the class-room is based upon the study and discussion of cases. In some of the courses students are required to read parallel assignments in text-books.

In conducting the discussion of cases in the class-room every effort is made to lead the student to a clear understanding of the fundamental legal principles that may be involved, and to afford him scientific training in accurate methods of study and of reasoning along legal lines.

Subjects involving the adjective law are in charge of professors who are engaged in active practice. The general principles of these subjects,

taught in the same manner as indicated above, are developed by practice before the Moot Courts.

UNDERGRADUATE PROFESSIONAL COURSES.

Undergraduate students in Arts and Sciences upon the completion of forty-five units of credit may take the first year's work of the course for Bachelor of Laws, crediting them fifteen units, on the completion of which they may receive the academic degree.

COURSES OF INSTRUCTION.

A. LEADING TO THE DEGREE OF BACHELOR OF LAWS.

The course of instruction leading to the degree of Bachelor of Laws extends through a period of three years. A minimum of thirty-six hours' work is required of all candidates for this degree.

Students devoting their whole time to the study of law may, with the permission of the Dean, select additional subjects from the second and third years, provided the aggregate of the hours taken does not exceed fifteen a week. Such excess credits may be applied toward the degree of Master of Laws.

FIRST YEAR SUBJECTS.

First Semester.

* Contracts. Assistant Professor MUMMA. Three hours a week. Williston's Cases on Contracts.

* Torts. Professor THURSTON. Two hours a week. Ames & Smith's Cases on Torts.

* Property I. Professor ———. One hour a week. Gray's Cases on Property, Volume I.

Constitutional Law. Professor HARLAN. Two hours a week. Cooley's Constitutional Law and McClain's Cases on Constitutional Law.

Criminal Law. Professor EARNEST. Two hours a week. Clark's Criminal Law and Mikell's Cases on Criminal Law.

Agency. Assistant Professor MUMMA. Two hours a week. Wambaugh's Cases on Agency.

Introduction to the Study of Law. Professor LORENZEN. An elementary course of lectures, with collateral reading, intended to assist the student beginning the study of law. It will deal with (1) the nature, scope, classification, and history of the law; (2) how and where to find the law, and (3) courts and procedure. Woodruff's Introduction to the Study of Law.

*The subjects marked with an asterisk are given both in the forenoon and afternoon.

Second Semester.

* Contracts. Assistant Professor MUMMA. Three hours a week. Williston's Cases on Contracts.

* Torts. Professor THURSTON. Two hours a week. Ames & Smith's Cases on Torts.

* Property I. Professor ———. Two hours a week. Gray's Cases on Property, Volumes I and II.

Criminal Procedure. Professor EARNEST. One hour a week. Clark's Criminal Procedure.

Domestic Relations. Professor LORENZEN. Two hours a week. Woodruff's Cases on Domestic Relations.

Bailments and Carriers. Professor ———. Two hours a week.

Damages. Professor ———. One hour a week. (Not given in 1910-11.)

SECOND YEAR SUBJECTS.

First Semester.

* Property II. Professor ———. Two hours a week. Gray's Cases on Property, Volumes II and III.

* Corporations. Private and Public. Professor LORENZEN. Four hours a week. Smith's Cases on Private Corporations. Smith's Cases on Municipal Corporations.

Common Law Pleading and Practice. Professor CLEPHANE. Two hours a week. Tyler's Stephen on Pleading.

Evidence. Professor PETER. Two hours a week. McKelvey on Evidence and Thayer's Cases on Evidence.

Equity I. Professor STAFFORD. Two hours a week. Ames' Cases on Equity Jurisdiction.

Second Semester.

* Property II. Professor ———. Two hours a week. Gray's Cases on Property, Volumes II and III.

* Quasi-contracts. Professor THURSTON. Two hours a week. Scott's Cases on Quasi-contracts.

* Sales. Assistant Professor MUMMA. Two hours a week. Williston's Cases on Sales.

Evidence. Professor PETER. Two hours a week. McKelvey on Evidence and Thayer's Cases on Evidence.

Equity Pleading and Practice. Professor CLEPHANE. One hour a week. Thompson's Cases on Equity Pleading and Practice.

Equity II. Professor STAFFORD. Two hours a week. Ames' Cases on Equity Jurisdiction.

Partnership. Professor PEELE. One hour a week. Burdick on Partnership and Gilmore's Cases on Partnership.

THIRD YEAR SUBJECTS.

First Semester.

* Property III. Professor ———. Two hours a week. Gray's Cases on Property, Volume V.

* Bills and Notes. Assistant Professor MUMMA. Two hours a week. Huffcut's Negotiable Instruments: Statutes, Cases, and Authorities.

* Corporations, Private and Public. Professor LORENZEN. Four hours a week. Smith's Cases on Private Corporations. Smith's Cases on Municipal Corporations.

* Brief Making. Assistant Professor LATIMER. One hour a week.

* Trusts. Professor THURSTON. Ames' Cases on Trusts. (Not given in 1910-11.)

Equity I. Professor STAFFORD. Two hours a week. Ames' Cases on Equity Jurisdiction.

Moot Court. Professors CLEPHANE, EARNEST, and PETER. Two hours a week.

Organization and Management of Corporations. Professor CLEPHANE. One hour a week. Clephane on the Organization and Management of Corporations.

Bankruptcy. Professor BRANDENBURG. One hour a week. Brandenburg on Bankruptcy.

Federal Procedure. Professor BRANDENBURG. One hour a week.

Water Rights and Irrigation. Professor VAN ORSDER. One hour a week. Long on Irrigation and assigned cases.

Admiralty. Professor ———. One hour a week. (Not given in 1910-11.)

Second Semester.

* Conflict of Laws. Professor LORENZEN. Four hours a week. Lorenzen's Cases on Conflict of Laws.

* Quasi-contracts. Professor THURSTON. Two hours a week. Scott's Cases on Quasi-contracts.

* Sales. Assistant Professor MUMMA. Two hours a week. Williston's Cases on Sales.

* Preparation of Legal Instruments. Assistant Professor LATIMER. One hour a week.

* Mortgages. Professor THURSTON. Two hours a week. Wyman's Cases on Mortgages. (Not given in 1910-11.)

* Insurance. Assistant Professor MUMMA. Two hours a week. Wambaugh's Cases on Insurance. (Not given in 1910-11.)

Suretyship. Assistant Professor MUMMA. Two hours a week. Ames' Cases on Suretyship.

Equity II. Professor STAFFORD. Two hours a week. Ames' Cases on Equity Jurisdiction.

Moot Court. Professors CLEPHANE, EARNEST, and PETER. Two hours a week.

Wills and Administration. Professor PETER. One hour a week.

Legal Tactics and Ethics. Professor CLEPHANE. One hour a week.

Extraordinary Legal Remedies. Professor ———. One hour a week.

B. LEADING TO THE DEGREE OF MASTER OF LAWS.

Students admitted as candidates for the degree of Master of Laws are required to elect subjects, not previously taken, covering a minimum of ten hours a week. These may be freely elected from the subjects offered by the Faculty of Law and from the following subjects given in the College of the Political Sciences:

International Law.

Comparative Constitutional Law.

Administrative Law.

Private Rights and Immunities under the Constitution.

Taxation.

Any excess credits obtained in this Law School in the course leading to the degree of Bachelor of Laws may be applied toward the Master's degree. The degree of Master of Laws will not be conferred, however, until one year after the receipt of the Bachelor's degree.

Advanced Practice.—Candidates for the Master's degree may also elect advanced practice work in the Moot Court, receiving therefor a credit of two hours for the year.

C. LEADING TO THE DEGREE OF MASTER OF PATENT LAW.

A special course in Patent Law and Patent Law Practice is given by Professor Church. The purpose of this course is to prepare those taking it for practice in all matters involving the law of patents. The course extends throughout one year, with two lectures or sessions of the Moot Court each week. (For the admission requirements for this course, see page 5.)

D. LEADING TO THE DEGREE OF DOCTOR OF JURISPRUDENCE.

The work for this degree is similar in character, method, and scope to that required for the degree of Doctor of Philosophy, and is under the

control of the University Faculty of Graduate Studies. See the General Catalogue of the University.

COURSES IN PRACTICE.

A. MOOT COURT WORK.

1. *Third Year:*

Particular stress is laid upon Moot Court work. Aside from the practice court connected with the course in Patent Law, there are four courts in which undergraduate students pursue their work. Three of these are *nisi prius* courts and are presided over by members of the Washington Bar in active practice. The fourth is a Court of Appeals to review the cases tried in the courts of first instance. This court is composed of the Chief Justice of the United States Court of Claims and of members of the Washington Bar.

Every third-year student before receiving the Bachelor's degree is required to prepare the pleadings in and prosecute to judgment the required number of cases in the *nisi prius* courts, with the privilege of appeal to the appellate tribunal. At least two hours in each week during the year must be spent by each third-year student in active participation in Moot Court work in the court-room to which he is assigned.

Statements of facts are furnished, such as would be related to a lawyer in active practice by his client. Each student must determine whether or not upon such facts the particular case in hand is one of common law or equitable cognizance. He must then frame his pleadings, serve his writs, and answer his adversary's pleadings until issue is joined in legal manner, after which the case is brought on for hearing in strict accordance with the rules of actual practice. Juries are empaneled in accordance with settled legal procedure, witnesses are examined and cross-examined, and the case conducted through all the various stages of the trial or hearing down to and including the judgment or decree, after which, should the case be appealed, it must be carried through the appellate court, involving the preparation of the record on appeal, briefs of counsel, etc.

2. *Fourth Year:*

The same facilities for Moot Court work as are described above are afforded in the course leading to the degree of Master of Laws. In this course, however, the nature of the cases assigned is somewhat different, involving, in addition to the ordinary cases at common law or in equity, cases of a special character, such as habeas corpus, certiorari, quo warranto, injunction, mandamus, extradition, replevin, attachment, etc.

3. *Officers and Equipment:*

The clerk of the Moot Court is one of the assistant clerks of the Supreme Court of the District of Columbia, but his assistants in each court-room are chosen from the student body, from whose ranks are also drawn the criers, jurors, and other officials, thus giving to the students the benefit of practice in administrative judicial machinery. The Moot Court is to all intents and purposes an actual court. The rooms in which the sessions are held are fitted up with judges' benches, clerks' desks, jury-boxes, and counsel table, and from the time the crier announces that the court is in session until he announces its adjournment the procedure is identical with that of a regular judicial tribunal.

It is believed that any student who gives the proper attention to this feature of the law curriculum will be enabled to go out from this institution and creditably try cases in court, although he may never have been in an actual court-room.

A careful record is kept of the work of each student, both as to his pleadings and his conduct of the case in court, and the ratings thus given determine, in connection with his ratings upon other subjects, whether or not he is entitled to a degree.

B. BRIEF MAKING.

In view of the rapidly increasing bulk of our case law, it becomes absolutely indispensable that students should be taught to find authorities in point, to collate them, and to present them to the court in a clear and concise form. In order to afford this training a course in Brief Making is given. This course will be conducted in part in the Library of the Department of Law, so that the use of the digests and reports may be illustrated.

C. PREPARATION OF LEGAL INSTRUMENTS.

Students are instructed in this course in the actual preparation of deeds, mortgages, wills, assignments, contracts, partnership agreements, and other legal instruments which a lawyer is called upon to prepare. Statements of facts are furnished to the class by the professor in charge, and each student is required to prepare the various forms of instruments. These are corrected by the professor and are discussed and criticised in class. Careful consideration is given to special forms of execution and acknowledgment when one of the parties to the instrument is a corporation, a partnership, a married woman, and the like.

D. LEGAL TACTICS AND ETHICS.

Every young lawyer entering upon his professional career is desirous of availing himself of the experience of an older practitioner and of

learning many things which are not taught and cannot be taught from books. It is to meet the needs of this class of men that this course is given. It is in charge of a member of the Washington Bar whose practice has been an active one, extending over a period of many years.

A short introductory talk is given upon the relations between attorney and client, including the important subject of fees, after which the student is given the benefit of practical hints upon the manner of starting in practice and opening and furnishing an office, with suggestions as to office systems. Advice is given as to selecting a law library, the best way to find authorities in point, and how such authorities should be used in court.

The student is told how to listen intelligently to his client's grievances; how to draw up the pleadings arising out of these grievances; how to prepare for trial the case thus made, including the work of preparing the evidence; how to try the case and examine and cross-examine witnesses; the manner of making up the record, and conducting the argument on appeal. The Canons of Professional Ethics adopted by the American Bar Association are studied in this course. At various times during the year distinguished lawyers are invited to appear and discuss informally special topics of interest to the students.

EXAMINATIONS AND GRADES.

A. UNDERGRADUATE COURSES.

Regular Examinations:

Written examinations are held at the close of each semester. All students, unless specially excused by the Dean, are required to take the first examination held after the completion of any subject.

No student, except by special permission of the Dean, will be allowed to take an examination in any subject unless he shall be regularly registered and have been in regular attendance upon the lectures and have done all the work required in the course of instruction upon that subject.

Grades:

At all examinations the grading of students will be indicated by the letters A, B, C, D, E, and F, representing, respectively, *excellent*, *good*, *satisfactory*, *fair*, *conditioned*, and *failed*.

Conditions:

A student receiving the grade of E (*conditioned*), in the regular examination in any course, will be given an opportunity to remove the condition by passing a subsequent examination with the grade of C or better.

The regular examinations for the removal of conditions will be held during the first week of each session. Applications for permission to take any of these examinations must be made to the Secretary of the Department of Law, in writing, not later than three days before the date for which such examination is scheduled. Candidates for the Bachelor's degree may, by action of the Faculty, be granted special examinations in not more than two subjects carried as conditions during the first semester of their last year, at the end of that semester, and in one subject carried as a condition during the second semester, at the end of that year.

A student receiving the grade of F (*failed*), in any examination, or the grade of D or E in any examination to pass off a condition in any course, will be required to take the course over again before being permitted to take another examination in such course.

Class Standing:

Students having conditions in more than two subjects will not be advanced from one class to another, nor will candidates for a degree be permitted to carry more than one condition into the second semester of the year in which they expect to be graduated. Students may have, however (subject to the provisions above enumerated), an opportunity to remove conditions, imposed during any session, by taking the regular examination for the removal of conditions at the beginning of the following session, for which no fee is charged.

Students having conditions in more than three subjects will not be allowed to register except upon special permission from the Dean.

Special Examinations:

No special examinations, other than those above provided for, will be granted to any students except those of the graduating class who, for good cause, shall have been excused by the Dean from taking any regular examination during the third year.

Attendance:

Regular attendance is required in all courses; and the examination grade of any student in any course may be withheld and the passing of another examination or the repetition of the course may be required on the sole ground of unsatisfactory attendance.

Election of Courses:

No student shall be allowed to register in courses aggregating more than fifteen hours during any one semester without first obtaining the permission of the Faculty.

Every student who is a candidate for graduation with the degree of Bachelor of Laws in his third year shall take and pass in each semester of his third year courses aggregating ten hours.

Election of courses to be taken must be made in all cases within ten days after the beginning of the semester in which such courses are given.

B. GRADUATE COURSES.

Examinations in graduate courses will be given at such times and under such conditions as may be designated by the professors in charge.

DEGREES.

1. BACHELOR OF LAWS.

The degree of Bachelor of Laws will be conferred upon students who shall have passed satisfactory examinations upon subjects aggregating thirty-six hours and whose attendance and conduct have been satisfactory to the Faculty. The degree will not be conferred upon students deficient in Bills and Notes, Common Law Pleading and Practice, Contracts, Corporations, Equity, Equity Pleading and Practice, Evidence, Moot Court, Property, and Torts.

The degree of Bachelor of Laws *with distinction* will be awarded to students whose average percentage in all subjects is equivalent to the grade of A.

2. MASTER OF LAWS.

The degree of Master of Laws will be conferred upon students who have completed the work prescribed for this degree with the grade of C or better and whose attendance and conduct have been satisfactory to the Faculty.

3. MASTER OF PATENT LAW.

The degree of Master of Patent Law will be conferred upon students who shall have successfully completed the work of the Patent Law course and whose attendance and conduct have been satisfactory to the Faculty.

4. DOCTOR OF JURISPRUDENCE.

The degree of Doctor of Jurisprudence is given for graduate work in the science of the law upon the same terms and conditions as the degree of Doctor of Philosophy in the Department of Arts and Sciences. See the General Catalogue.

LAW LIBRARY AND READING-ROOM.

A well-equipped working library, comprising about 5,300 volumes, is open to the students in the Law Building from 9.00 a. m. to 10.00 p. m. Competent librarians are in charge and will give students assistance in looking up subjects and in the use of books.

The Library contains the standard text-books, the West Reporter system of Federal and State Decisions complete, State Reports, the English Common Law and Chancery Reports, Encyclopædias of Law, Digests, reference books, and current law publications.

Adjoining the Library is a conversation-room for students, affording opportunity for consultation.

In addition to these facilities, the students have free access to the Congressional Library and other public libraries.

PRIZES.

The Ordronaux Prize Scholarship.—In accordance with the action taken by the Board of Trustees there shall be substituted for the University Prizes of \$40, \$30, and \$20 in cash heretofore offered a prize scholarship, to be known as "The Ordronaux Prize Scholarship," to be awarded to that member of the Second Year Class taking the regular course, whether forenoon or afternoon, who shall during his first and second years have attained the highest average grade. In determining the average grade of contestants the grade received in each subject shall be multiplied by the number of hours given to such subject and the sum of the results divided by the total number of hours. The recipient of this prize scholarship shall be entitled to receive credit for all tuition fees in his third year. Library and diploma fees will remain payable. The award of this scholarship is purely personal and will not be commuted to a cash payment, nor will it be transferable. The recipient of the scholarship shall be entitled to make use of the scholarship during the session next succeeding its award or during any session thereafter.

Edward Thompson Company Prize.—A prize offered by the Edward Thompson Company of a set of the Encyclopædia of Law, first or second edition, or a set of the Encyclopædia of Pleading and Practice, is awarded each year to the senior law student who shall write the best essay on some legal subject to be assigned by the Faculty. This prize will not be awarded, however, if the essays submitted do not possess sufficient merit.

Ellsworth Prize.—A prize of \$25 in gold, offered by Mr. Fritz von Briesen, called the "Ellsworth Prize," is awarded for the best work done in the Patent Law Course by a student receiving the degree of Master of Patent Laws.

PUBLIC SPEAKING.

Excellent facilities for training in the art of public speaking are afforded by the two debating societies that have been organized in the Department of Law. These societies, known as the Columbian and

Needham Debating Societies, meet weekly for debate. Membership in these societies is entirely optional, but their work is encouraged in every legitimate way by the Faculty, and students are urgently advised to take part in their exercises. During each academic year several intercollegiate debates are held. Membership upon the intercollegiate debating teams is an honor eagerly sought and made the prize to be won in separate preliminary contests. The general conduct of these intercollegiate debates is under the supervision of a committee from the Faculty.

ADMISSION TO THE BAR OF THE DISTRICT OF COLUMBIA.

By the rules of the Supreme Court of the District of Columbia, applicants for admission to the Bar are required to have studied law for three years under the direction of a competent attorney, but by those rules the course in the Department of Law of the University is regarded as discharging this requirement.

FEES.

1. Matriculation fee (payable once).....	\$5
2. Annual library fee.....	3
3. Tuition fee per annum for each hour taken per week.....	10
4. Late registration fee in the case of students registering for the first term after October 20, or for the second term after February 20, excepting for courses which do not begin with the terms.....	2
5. Fee for graduation.....	10
6. Tuition fee for course in Patent Law.....	40
7. Fee for a certificate under the seal of the University.....	2

No change will be made in the fees fixed at the time of registration except in case of withdrawal, and then only upon notice in due form, and from the end of the current quarter session when such withdrawal shall be approved. Applications for the granting of a withdrawal should be made on the prescribed form to be obtained from the Secretary of the Department of Law and will only be received at the end of a quarter session.

The library fee will not be charged for the first half-year during which a course is completed in the case of students who enter at the beginning of the second half-year and pay the library fee for that year.

PAYMENT OF FEES.

All fees are to be paid to the Treasurer. Tuition fees are payable quarterly in advance. Matriculation and library fees are payable in full in advance.

BOARD AND ROOMS.

A register of approved boarding houses is kept by the Treasurer. Accommodations cost from \$20 to \$40 a month.

For catalogues, application blanks, and further information, address

THE SECRETARY OF THE DEPARTMENT OF LAW,
The George Washington University,
Washington, D. C.

Students.

DEPARTMENT OF LAW.

Bachelor of Laws and Bachelor of Law.

First Year.

Name.	Legal residence.	City address.
Applebaum, Aaron Eleazar.....	N. J.....	1311 7th Street.
Baker, John Earl.....	Wis.....	2012 G Street.
Ph.B., 1906, M.A., 1908, University of Wisconsin.		
Barber, Azro Lucien.....	N. Y.....	1515 O Street.
A.B., 1907, Syracuse University.		
Beale, Frederick Wight.....	Ill.....	2242 Ontario Road
M.E., 1899, Stevens Institute of Technology.		
Bergman, Theodore Robert.....	N. Y.....	206 Indiana Ave.
Bickel, Harvey Cleveland.....	Pa.....	1318 12th Street.
Boeckel, William Jacob.....	Md.....	533 9th Street, S. E.
Bond, Eugene Webster.....	Ill.....	404 Shepherd Street.
Petworth, D. C.		
Boughton, George Wilson.....	D. C.....	1424 K Street.
Brown, Lee Hoxil.....	D. C.....	2464 Ontario Road.
Calley, Walter England.....	Pa.....	1503 12th Street.
S. B., 1903, University of Chicago.		
Carpenter, Newton Ford.....	D. C.....	2268 Cathedral Ave.
Clark, Henry Culbertson.....	D. C.....	Takoma Park, D. C.
B.A., 1910, The George Washington University.		
Clifton, John Williams.....	Tenn.....	Y. M. C. A.
B.A., 1903, M.A., 1904, Vanderbilt University.		
Coleman, Harry Edward.....	Pa.....	1412 Belmont Street.
Coulson, Robert Earl.....	N. Y.....	1422 Belmont Street.
A.B., 1909, Cornell University.		
Cox, John Dee.....	Texas.....	Patent Office.
Davis, Max Warburton.....	Conn.....	628 A Street, N. E.
M.E., 1908, Cornell University.		
Davis, William Edward.....	Md.....	1205 N Street.
A.B., 1907, Western Maryland College.		
De Baun, Claud.....	Ariz.....	1132 8th Street.
Denman, Charles Arthur.....	Neb.....	604 C Street, N. E.
De Wolf, Richard Crosby.....	Mass.....	Library of Congress.
Dobson, James Martin.....	S. D.....	119 2d Street, N. E.
B.Litt., 1909, Dakota Wesleyan University.		

THE GEORGE WASHINGTON UNIVERSITY.

Name.	Legal residence.	City address.
Dulles, John Foster..... A.B., 1908, Princeton University.	N. Y.....	1323 18th Street.
Dunlop, Walter Grafton..... B.S., 1909, Princeton University.	D. C.....	3102 Q Street.
Dutton, Clarence Benjamin.....	Mass.....	1209 Emerson Street.
Fehr, John Ralph.....	Ill.....	1538 17th Street.
Feland, John Caldwell.....	Ky.....	3032 Dent Place.
Foote, Morris Cooper.....	D. C.....	16 5th Street, S. E.
Forbes, Harvey Dwight.....	N. Y.....	2955 Tilden Street.
Frazier, Robert Thomas, Jr.....	D. C.....	1823 Lamont Street.
French, Louis Edwin.....	Ia.....	506 House Office Bldg.
Galleher, Parke Ashby.....	D. C.....	116 3d Street, N. E.
Gamble, Ralph Abernethy..... Litt.B., 1909, Princeton University.	S. D.....	U. S. Senate.
Gauss, Henry Colford.....	D. C.....	1359 Park Road.
Geiman, Daniel J.....	Va.....	1404 M Street.
Gerard, Charles Wesley..... A.B., 1906, Ohio State University.	D. C.....	2212 Flagler Place.
Gerhardt, Louis Webster.....	Pa.....	1202 K Street.
Gordon, Ray Bragdon.....	Mass.....	1723 Euclid Street.
Gordon, Spencer..... A.B., 1909, Princeton University.	D. C.....	3028 Q Street.
Guptill, Leon Clifton..... B.A., 1909, Colby College.	Me.....	320 Maryland Ave, N. E.
Hanna, Forest Walker..... B.A., 1909, Northwestern University.	Mo.....	910 Westminster Street.
Hart, Wayne Maris.....	D. C.....	1536 6th Street.
Hawley, Charles Taft..... B.S., 1898, M.E., 1908, Worcester Polytechnic Institute.	Mass.....	116 Maple Ave., Takoma Park, Md.
Hayward, Afton Smith..... B.S., 1906, Amherst College.	Mass.....	1148 17th Street.
Helms, Birch..... B.A., 1909, Yale University.	Pa.....	Colorado Building.
Herman, Morris D.....	Minn.....	617 K Street.
Hidalgo y Rizal, Alfredo..... B.S., 1903, Liceo de Manila.	P. I.....	234 F Street.
Hoover, Joseph Raymond.....	D. C.....	1118 9th Street.
Houston, William Cannon, Jr.....	Tenn.....	House of Rep.
Howard, Hugh McCormick..... Graduate, 1902, Virginia Military Institute.	D. C.....	1849 Wyoming Ave.
Hudson, Douglas Granville.....	Kans.....	1324 I Street.
Humason, Harris Monroe..... A.B., 1909, Yale University.	Conn.....	1445 Mass. Ave.

DEPARTMENT OF LAW.

21

Name.	Legal residence.	City address.
Hunter, Orren Franklin.....	S. C.....	1537 Monroe Street. B.S., 1894, South Carolina Military Academy.
Hutchins, William Ambrose.....	Ohio.....	1217 Harvard Street.
Kause, Arthur John.....	D. C.....	1905 Jackson St., N. E.
Kelly, Lawler John.....	Iowa.....	2145 K Street.
Kemper, William Holbrook.....	D. C.....	1323 Clifton Street.
Knox, Hugh Smith.....	Pa.....	1527 K Street. B.A., 1907, Yale University.
Kunkel, Frederick Eugene.....	Pa.....	1538 17th Street.
Lamb, William Ers.....	D. C.....	1322 I Street. B.S., 1909, Dartmouth College.
Lawrence, Wayman Clarkson, Jr.....	Ohio.....	New Varnum Hotel. Litt. B., 1909, Princeton University.
Lazarus, Isaac Burt.....	Mass.....	1121 6th Street.
Leavitt, Ezekiel.....	D. C.....	1201 N. Capitol Street. Odessa Gymnasium, Russia.
Ledon y Queipo, Gonzalo.....	Cuba.....	1915 14th Street.
Lindeman, Clarence Albert.....	Calif.....	807 11th Street.
Lotka, Alfred James.....	D. C.....	2016 G Street. B.Sc., 1901, Birmingham (England) University. M.A., 1909, Cornell University.
Macfarland, Horace Greeley.....	D. C.....	1727 F Street. Graduate, 1891, United States Naval Academy.
Mapes, Carl Anthony.....	Mich.....	507 6th Street, N. E.
Matthews, Emerson Waldo.....	Ohio.....	The Wellington. A.B., 1891, Butler College. A.M., Harvard University.
McElfresh, Ralph Finley.....	D. C.....	309 M Street. C.E., 1908, Lehigh University.
Miles, Edwin Ruthven.....	Utah.....	1333 R Street.
Miller, Thomas Woodnutt.....	Del.....	1920 I Street. Ph.B., 1908, Yale University.
Miller, Lawrence Arnold Gale.....	Mass.....	Patent Office. A.B., 1908, Harvard University.
Moakley, Harry Joseph.....	Conn.....	1433 Fairmont Street. Ph.B., 1908, Yale University.
Momsen, Richard Paul.....	Wis.....	House of Rep.
Moore, James Ballard.....	D. C.....	1869 Columbia Road.
Moore, Rowles.....	Ky.....	937 Massachusetts Ave.
Morris, Leland Burnette.....	Pa.....	Hotel Richmond.
Mueller, Edward Louis.....	D. C.....	803 8th Street.
Munden, Ralph.....	Pa.....	The Portner. M.E., 1906, Cornell University.

THE GEORGE WASHINGTON UNIVERSITY.

Name.	Legal residence.	City address.
Murray, Harry Keyes..... M.A., 1903, St. Aloysius College.	Miss.....	Room 176, House of Rep. Building.
Nairn, William Wallace, Jr.....	D. C.....	901 Lawrence St., N. E.
Newhouser, Roy Lyman Joseph.... B.A., 1909, The George Washington University.	D. C.....	217 E. Capitol Street.
Nixon, Cleon Robert..... B.S., 1909, Shurtleff College.	Ill.....	1110 New York Ave.
Ogilby, Charles Fitz Randolph, Jr..	D. C.....	1528 P Street.
Oren, James Paul.....	Pa.....	Y. M. C. A.
Orme, James Booth Lockwood.... S.B., 1906, Massachusetts Institute of Technology.	D. C.....	1623 28th Street.
Packard, Roscoe Milliken..... A.B., 1899, M.A., 1900, Western Reserve University.	D. C.....	Patent Office.
Perham, Sidney Feild.....	D. C.....	2129 P Street.
Parkinson, George Doney.....	Idaho.....	House of Rep.
Patrick, Rollin Moore..... A.B., 1901, Davidson College.	Idaho.....	Reclamation Service.
Peck, George Curtis.....	N. Y.....	1515 O Street.
Powell, Wilson Albert.....	Va.....	1515 O Street.
Prescott, Edward Chepmell.....	Iowa.....	312 A Street, N. E.
Preston, Neil De Forest..... M.E., 1908, Cornell University.	N. Y.....	1824 California Street.
Ramsay, Robert Everett.....	Md.....	615 22d Street.
Richards, Ralph Walter Bergman..	D. C.....	101 Massachusetts Ave.
Richardson, Madison..... B.A., 1909, Wofford College.	S. C.....	1802 G Street.
Roberts, David Robert.....	Utah.....	715 15th Street.
Rose, Claude Custer..... M.E., 1905, Ohio State University.	Ohio.....	1212 Irving Street.
Scanlan, Tom.....	S. Dak.....	1404 L Street.
Scheffer, Joseph Walter.....	Conn.....	2124 Pennsylvania Ave.
Schnare, Lester L.....	Ga.....	Y. M. C. A.
Schreiber, Ernst Otto, Jr..... B.A., 1910, The George Washington University.	D. C.....	642 E Street, N. E.
Shaw, Paul James.....	Pa.....	1826 G Street.
Sheppard, Carl Dunkle..... Ph.B., 1902, Ohio State University.	Ohio.....	Florence Court.
Simon, Rabbi Abram..... Graduate, 1894, Cincinnati Hebrew Union College. B.L., 1894, University of Cincinnati. Ph.D., 1907, The George Washington University.	D. C.....	2606 University Place.
Smith, Charles Watson.....	Pa.....	1111 M Street.
Smith, St. Clair.....	S. Dak.....	1404 L Street.

Name.	Legal residence.	City address.
Spessard, Walter Valentine.....	Pa.....	1115 K Street. A.B., 1909, Lebanon Valley College.
Straw, Charles Alonzo, Jr.....	Del.....	3014 Dent Place. A.B., 1901, Harvard University.
Sutton, Loyd Hall.....	Mass.....	1333 Fairmont Street. S.B., 1908, Massachusetts Institute of Technology.
Townsend, Wilson Lewis.....	Md.....	Kensington, Md.
Viles, Voler V.....	Mo.....	328 Maryland Ave., N. E.
von Schrader, Atreus Hargadine..	Mo.....	2162 Florida Ave. A.B., 1909, Harvard University.
Wheeler, Lucien Charles.....	D. C.....	The Duddington.
Yancey, Charles Layton.....	Va.....	1515 O Street. B.A., 1908, Randolph-Macon College.
Young, George William.....	D. C.....	1365 Meridian Street.
Zeh, Henry William.....	D. C.....	1357 Harvard Street.

Second Year.

Alexander, Preston Carter.....	Mo.....	1110 Rhode Island Ave. A.B., 1909, University of Missouri.
Anderson, Charles.....	Texas.....	216 N. Capitol St.
Baer, David Alphonse.....	D. C.....	3044 N Street. B.A., 1910, The George Washington University.
Baldwin, Edward Damon.....	Ore.....	House of Rep. B.Lit., 1906, Whitman College. M.A., 1909, The George Washington University.
Beneman, George.....	Md.....	1336 7th Street.
Berry, James William.....	D. C.....	14 3d Street, S. E. B.A., 1909, The George Washington University.
Bloomer, George Beale.....	D. C.....	1410 G Street.
Burns, Walter William.....	N. Y.....	518 Shepherd Street. M.E., 1908, Cornell University.
Butler, Comfort Straight.....	Ill.....	26 Iowa Circle. A.B., 1909, University of Illinois.
Byrn, Edward Wright, Jr.....	Md.....	Silver Spring, Md.
Callister, Edward Richard.....	Utah.....	407 B Street, N. E.
Carpenter, John Condict.....	D. C.....	1318 Vermont Ave. M.E., 1908, Cornell University.
Church, Melville Durant.....	D. C.....	1608 20th Street.
Councilor, James Allan.....	Iowa.....	2012 1st Street.
Cox, Henry Aubrey.....	Tenn.....	Y. M. C. A.
Curl, Joseph Ryland.....	D. C.....	2312 I Street. B.S., 1909, The George Washington University.
Davis, Warren Jefferson.....	Va.....	26 Iowa Circle. B.A., 1903, Eastern College.

THE GEORGE WASHINGTON UNIVERSITY.

Name.	Legal residence.	City address.
Disque, William Alfred.....	Ky.....	Y. M. C. A.
Dodge, Parker Van Patten.....	D. C.....	134 B Street, N. E.
S.B., 1907, Massachusetts Institute of Technology.		
Du Bois, Henry Pastor.....	Pa.....	1421 Chapin Street.
M.E., 1907, Cornell University.		
Eickhoff, Theodore Henry.....	Ind.....	1522 16th Street.
B.S. in E.E., 1908, Purdue University.		
Farmer, Matthew Singleton, Jr....	N. C.....	154 A Street, N. E.
Fauntleroy, John Smith Young....	La.....	House of Rep.
A.B., 1905, Louisiana State University.		
Fischer, Stanley Herman.....	D. C.....	1515 T Street.
Foo, Hsen Shuen.....	China.....	Chinese Legation.
A.B., 1906, The Ching Chong School.		
Fraser, William Wright.....	Md.....	Patent Office.
A.B., 1905, New Windsor College.		
Gerhart, Herbert Benjamin.....	Pa.....	918 23d Street.
Gill, Walter Josiah, Jr.....	Mass.....	Patent Office.
S.B., 1904, Massachusetts Institute of Technology.		
Goode, Philip Burwell.....	D. C.....	Patent Office.
A.B., 1907, Harvard University.		
Graves, Sheldon Heber.....	D. C.....	1221 K Street.
B.S., 1904, Columbian University.		
M.S., 1906, The George Washington University.		
Gray, Jay Lyman.....	Me.....	320 Maryland Ave., N.E.
A.B., 1908, Bowdoin College.		
Gross, Le Roy Coates.....	N. J.....	1202 K Street.
Herriott, David Paul.....	Pa.....	1700 15th Street.
A.B., 1905, Washington and Jefferson College.		
Hilton, Charles Vanderbilt.....	Md.....	3264 N Street.
Hutchinson, Frederick Porter....	Kans.....	1421 Chapin Street.
Hynson, Richard Washburn.....	D. C.....	1335 N Street.
Johnston, Horace Stuart.....	D. C.....	122 F Street, S. E.
Kemper, Edward Crawford.....	D. C.....	1323 Clifton Street.
Lilly, Scott Henry.....	Iowa.....	4122 7th Street.
B.A., 1897, Cornell College.		
Linnell, William Shepherd.....	Me.....	320 Maryland Ave., N. E.
A.B., 1907, Bowdoin College.		
Long, Franklin Samuel.....	D. C.....	2206 Flagler Place.
Manning, George Madison A.....	Ky.....	2024 G Street.
Mechlin, Ernest Frederick.....	D. C.....	Patent Office.
B.S., 1907, The George Washington University.		
Miller, Herman.....	Nebr.....	Patent Office.
B.S., 1898, Nebraska Wesleyan University.		

Name.	Legal residence.	City address.
Moore, Hervey Studdiford.....	N. J.....	1700 15th Street.
Moyer, Samuel.....	Pa.....	323 W Street, N. E.
Myers, John Dashiell.....	D. C.....	1634 Riggs Place.
Neal, Franklin Gilman.....	Mass.....	1623 Park Road.
Ph.B., 1908, Yale University.		
Nicholson, Soterios.....	Greece.....	1801 G Street.
O'Neal, Warwick Christy.....	D. C.....	District Building.
C.E., 1906, Pennsylvania Military College.		
Owen, Richard Blakelock.....	D. C.....	1504 H Street.
Palais, Maurice.....	Mass.....	206 Indiana Avenue.
Paltridge, George Henry.....	Ill.....	1909 I Street.
Place, Ernest Frederic Alan.....	N. Y.....	House of Rep.
Preston, J. Stanley.....	N. Y.....	Y. M. C. A.
Reavis, Andrew Bryant.....	Tenn.....	Patent Office.
Rowland, Guy Edwin.....	Texas.....	Chevy Chase, Md.
Rush, Clifford Alvin.....	Kan.....	Y. M. C. A.
Schoenfeld, Hans Fred. Arthur.....	N. J.....	3448 24th Place, Cleve-
land Park, D. C.		
B.A., 1907, M.A., 1909, The George Washington University.		
Sheridan, Thomas Harold.....	N. H.....	Y. M. C. A.
Shuster, William Morgan.....	D. C.....	1722 Q Street.
Stebbins, George Edwin.....	Mass.....	Patent Office.
A.B., 1903, Bates College.		
Ph.D., 1907, Clark University.		
Stinchfield, Ray Lewis.....	Mass.....	Y. M. C. A.
B.S., Worcester Polytechnic Institute.		
Smith, Jesse Bond.....	D. C.....	101 Chestnut Street. Ta-
koma Park, D. C.		
Taylor, George Carroll.....	Va.....	1515 O Street.
Thorp, Clarendon Herbert.....	Ohio.....	824 8th Street.
Tilton, Rufus Harold.....	Mass.....	26 Iowa Circle.
Ph.B., 1908, Wesleyan University.		
Walker, John Earl.....	Mich.....	1012 15th Street.
B.S., 1907, Kalamazoo College.		
B.S., 1907, Chicago University.		
Wann, Eugene Charles.....	D. C.....	144 F Street, S. E.
Warden, Franklin Milton.....	Ill.....	26 Iowa Circle.
Webber, Lane Davis.....	Ind.....	905 13th Street.

Third Year.

Allee, James Frank, Jr.....	Del.....	523 13th Street.
Barrick, Henry Llewellyn.....	Neb.....	The Plymouth.
Birney, William McDowell.....	D. C.....	1516 22d Street.

THE GEORGE WASHINGTON UNIVERSITY.

Name.	Legal residence.	City address.
Black, Charles Frederick.....	Vt.....	1101 14th Street. Ph.B., 1907, University of Vermont.
Blount, Walter Eames.....	D. C.....	3101 R Street.
Bradley, Paul Earl.....	Ill.....	Y. M. C. A.
Brantley, William Gordon, Jr.....	Ga.....	2024 G Street. A.B., 1907, University of Georgia.
Calvert, John Wentworth.....	Md.....	1750 Corcoran Street.
Campbell, Philip Barraud.....	D. C.....	1977 Biltmore Street.
Carpenter, Walter Clayton.....	R. I.....	Y. M. C. A. Ph.B., 1906, Brown University.
Caywood, Charles Chester.....	D. C.....	1629 Newton Street.
Crafts, Frederick Albert.....	Mass.....	1700 15th Street.
Crowell, William Butterworth.....	Ohio.....	516 Shepherd Street.
Dahn, Franz Frederick Wm.....	Minn.....	1515 O Street. B.S., 1909, The George Washington University.
Dallwig, Paul.....	Wis.....	1931 K Street.
Davenport, Lewis Howard.....	N. Y.....	207 9th Street, S. W.
Dodson, James Dunbar.....	D. C.....	1714 F Street.
Everett, Frank Orear.....	Mo.....	916 14th Street. B.A., 1909, The George Washington University.
Faulkner, William Ernest.....	Ky.....	7 S Street. B.A., 1907, Union College.
Fenwick, Frank Knox.....	Mo.....	1229 15th Street.
Ford, Frank Farnsworth.....	Mich.....	26 Iowa Circle.
Garrett, Clyde Davis.....	D. C.....	945 O Street.
Garrett, George Everett.....	Va.....	Patent Office.
Gates, Edward Percy.....	D. C.....	3506 Center Street. B.A., 1908, The George Washington University.
Gonzalez, Antonio Cornelius, Jr.....	N. Y.....	1417 K Street.
Graff, William Archibald.....	Va.....	1322 Vermont Ave.
Graves, Pleasant Fowler.....	Texas.....	26 Iowa Circle. Ph.B., 1905, Southwestern University.
Grover, William Robinson.....	Mich.....	1012 15th Street. Ph.B., 1907, Kalamazoo College.
Hellen, Arthur.....	D. C.....	1731 20th Street.
Hemmick, Frank Schley.....	D. C.....	1700 15th Street.
Hill, Herman Henry.....	Mass.....	60 M Street. A.B., 1907, Dartmouth College.
Holcombe, Amasa Maynard.....	Mass.....	1325 Vermont Ave. B.S., 1904, Massachusetts Institute of Technology.
Hubbard, Lyle.....	Iowa.....	1700 15th Street.
Hupper, Roscoe Henderson.....	Me.....	320 Maryland Ave., N. E. A.B., 1907, Bowdoin College.

Name.	Legal residence.	City address.
Kitselman, Harry Louis.....	Ind.....	The Burlington.
Le Duc, Louis Bronson.....	D. C.....	1403 21st Street.
Mackenzie, Robert Lundie.....	Ore.....	807 11th Street.
MacPhail, Leland Stanford.....	Mich.....	The Toronto.
McCray, Claud Henry.....	N. Y.....	930 18th Street.
B.S., 1907, Hobart College.		
Oberlin, John Jay.....	Md.....	Patent Office.
A.B., 1901, Washington and Lee University.		
Patterson, Matthew Warren.....	Ark.....	Dept. of Agriculture.
Pease, Ferdinand Henry.....	Vt.....	1101 14th Street.
A.B., 1907, University of Vermont.		
Pillow, Gideon Johnston.....	La.....	1464 Clifton Street.
Scantling, Philip Lee.....	D. C.....	1627 R Street.
Simmons, Berkeley Leo.....	D. C.....	Kellogg Building.
Simmons, William Wyatt.....	Miss.....	Y. M. C. A.
B.A., 1905, Mississippi College.		
Sincerbeaux, Chauncey Milton....	N. Y.....	1920 I Street.
A.B., 1905, Yale University.		
Singleton, Ogle Ridout.....	D. C.....	2020 H Street.
B.A., 1908, The George Washington University.		
Smith, Conger Ryder.....	Mich.....	Y. M. C. A.
Smith, George Thomas.....	Md.....	437 Massachusetts Ave.
Smith, Thomas William.....	Idaho.....	Y. M. C. A.
Smithers, Nathaniel Barratt.....	Del.....	518 13th Street.
Smoot, John Daniel Kurtz.....	Va.....	Langley, Va.
Steele, Benjamin Ulen.....	Ky.....	The Lincoln Apts.
Sullivan, Horace Moore.....	Tenn.....	1468 Clifton Street.
Swift, John Tuttle.....	Mass.....	1101 14th Street.
Taylor, Kenneth.....	Minn.....	1433 Belmont Street.
B.S., 1907, Carleton College.		
Thomas, Bert Carl.....	Ohio.....	1615 Florida Ave.
Thompson, Oscar.....	Wis.....	1229 15th Street.
Tucker, John Randolph.....	Va.....	417 A Street, S. E.
Tyrer, Arthur James.....	Wash.....	The Albemarle.
Van Vleck, William Cabell.....	D. C.....	719 Quincy Street.
B.A., 1908, The George Washington University.		
White, Herbert William.....	Iowa.....	1700 15th Street.
Ph.B., 1907, Simpson College.		
Wilmer, Edward George.....	Wis.....	308 F Street.
Wyatt, Hardee.....	N. Mex.....	1400 Belmont Street.
B.A., B.S., L.L., 1900, University of Nashville.		
Zirkle, Joseph Claiborne.....	Va.....	837 Shepherd Street.

THE GEORGE WASHINGTON UNIVERSITY.

Master of Laws.

Name.	Legal residence.	City address.
Blanchard, Edwin Clay.....	Va.....	808 Mass. Ave., N. E.
LL.B., 1908, Georgetown University.		
Brown, Forrest Augustus.....	W. Va.....	1700 15th Street.
LL.B., 1909, University of Virginia.		
Calhoun, Clarence Crittenden.....	Ky.....	Evans Building.
M.Dip., 1905, The George Washington University.		
Clements, Elmer Ellsworth.....	N. Dak.....	203 F Street.
LL.B., 1907, Washington College of Law.		
Concepcion y Nava, Severiano....	P. I.....	House of Rep.
B.A., 1902, Colegio Filipino.		
Dickerson, Roy Ernest.....	Colo.....	2517 14th Street.
LL.B., 1909, University of Denver.		
Duer, Leland Blodget.....	Md.....	1720 I Street.
A.B., 1905, LL.B., 1909, Harvard University.		
Edgerton, Frank Eugene.....	Neb.....	412 4th Street, N. E.
A.B., 1900, University of Nebraska.		
LL.B., 1909, The George Washington University.		
Fravel, F. Russell.....	Mass.....	1016 15th Street.
LL.B., 1908, The George Washington University.		
Holmes, Rexford Louie.....	Mo.....	1114 D Street, N. E.
LL.B., 1908, The George Washington University.		
Horn, Oscar Leonard.....	Calif.....	2517 14th Street.
LL.B., 1908, University of Southern California.		
Mapa, Emilio.....	P. I.....	Manila, P. I.
Patterson, Charles Herman.....	N. Y.....	1732 16th Street.
Graduate, 1903, United States Military Academy.		
LL.B., 1909, New York Law School.		
Phair, Philip De Witt.....	Me.....	131 A Street, N. E.
M.A., 1895, Harvard University.		
LL.B., 1909, The George Washington University.		
Phillips, Adon Daniel.....	N. Y.....	3560 11th Street.
B.S., 1906, LL.B., 1908, The George Washington University.		

Master of Patent Law.

Alden, Henry Palmer.....	D. C.....	1308 S Street.
LL.B., 1907, The George Washington University.		
Aveilhé, Mrs. Lillian Brock.....	D. C.....	229 Mass. Ave., N. E.
LL.B., 1905, Washington College of Law.		
Bachmann, Frederick.....	Md.....	1615 Florida Ave.
LL.B., 1909, National University.		
Bohleber, William.....	Ill.....	Patent Office.
LL.B., 1909, National University.		

Name.	Legal residence.	City address.
Cook, Parker.....	N. Y.....	21 8th Street, N. E.
Dennison, Augustus S.....	Wash.....	1931 K Street.
L.L.B., 1909, National University.		
Dorsey, Roscoe John Conklin....	D. C.....	1519 Vermont Ave.
L.L.B., 1902, LL.M., 1903, Georgetown University.		
M.Dip., 1907, D.C.L., 1908, The George Washington University.		
Gallagher, Laurence Joseph.....	N. Y.....	Patent Office.
B.E., 1903, Union College.		
L.L.B., 1909, Georgetown University.		
Gilchrist, Walter Schell.....	D. C.....	704 A Street, N. E.
A.B., 1902, LL.M., 1908, Georgetown University.		
L.L.B., 1907, The George Washington University.		
Halstead, Friend Orin.....	Ind.....	Patent Office.
L.L.B., 1909, National University.		
Houstin, Harry Isaac.....	Ill.....	1248 Irving Street.
A.B., 1898, Knox College.		
L.L.B., 1909, Georgetown University.		
Kane, John J.....	Mass.....	914 H Street.
B.S., 1905, Worcester Polytechnic Institute.		
L.L.B., 1909, Georgetown University.		
Kent, Otis Beall.....	Texas.....	The Carolina.
L.L.B., 1907, LL.M., 1908, Georgetown University.		
Lanahan, Henry.....	Md.....	Patent Office.
B.A., 1896, Johns Hopkins University.		
L.L.B., 1909, National University.		
McDermott, Charles William....	Mass.....	1722 21st Street.
Milburn, Joseph Woodward.....	Md.....	Patent Office.
Ph.B., 1902, A.M., 1904, Dickinson College.		
L.L.B., 1909, Georgetown University.		
Morgan, Elonzo Tell.....	W. Va.....	1344 Kenyon Street.
B.S., 1906, The George Washington University.		
L.L.B., 1908, National University.		
Nickel, William Frederick.....	D. C.....	1338 Otis Place.
B.S. in E.E., 1909, The George Washington University.		
Rockwell, Henry Ensign.....	D. C.....	31 S Street.
Sanderlin, George Bismarck.....	Md.....	509 4th Street.
A.B., 1899, A.M., 1900, Wake Forest College.		
L.L.B., 1908, The George Washington University.		
Saunders, Marie Katherine.....	Okla.....	The Brunswick.
L.L.B., 1909, Washington College of Law.		
Smith, Harold Elno.....	N. H.....	The Wellington.
A.B., 1903, A.M., 1906, Dartmouth College.		
L.L.B., 1908, LL.M., 1909, National University.		
Stonebraker, Harold English....	D. C.....	645 Mass. Ave., N. E.
B.S., 1908, The George Washington University.		

THE GEORGE WASHINGTON UNIVERSITY.

Name.	Legal residence.	City address.
Styll, Harry Halstead.....	Pa.....	c/o Amer. Optical Co., Southbridge Mass.
I.L.B., 1909, Georgetown University.		
Swenarton, Harold Augustus.....	N. J.....	1538 17th Street.
Ph.B., 1905, Yale University.		
B.L., 1909, The George Washington University.		
Wright, Frederick B.....	N. Y.....	1503 Q Street.
LL.B., 1888, LL.M., 1889, Columbia University.		

Special, Patent Law.

Birney, William McDowell.....	D. C.....	1516 22d Street.
LL.B., 1910, The George Washington University.		
Cohen, Nathan.....	Minn.....	617 K Street.
E.E., 1906, University of Minnesota.		
Edgerton, Frank Eugene.....	Neb.....	412 4th Street, N. E.
A.B., 1900, University of Nebraska.		
LL.B., 1909, The George Washington University.		
Graff, William Archibald.....	Va.....	1322 Vermont Avenue.
Hellman, Carl A.....	Ill.....	Patent Office.
B.S., 1906, M.S., 1909, University of Illinois.		
Kitselman, Harry Louis.....	Ind.....	The Burlington.
Parsons, Harold Kent.....	Iowa.....	1413 Chapin Street.
Powers, Charles Wallace.....	D. C.....	502 E Street, N. E.
S.B., 1907, Worcester Polytechnic Institute.		
Sheridan, Thomas Harold.....	N. H.....	Y. M. C. A.

Special.

Babcock, Richard Earle.....	D. C.....	707 G Street.
Behrmann, Carl Martin.....	Ill.....	Y. M. C. A.
Bullion, Clarence Leroy.....	Ohio.....	1707 13th Street.
Borchardt, Edwin Montefiore.....	N. Y.....	116 C Street, N. E.
B.S., 1905, Columbia University.		
LL.B., 1908, New York Law School.		
Calder, Albert Russell.....	Pa.....	1700 15th Street.
Cohen, Abe.....	Wis.....	1322 Vermont Avenue.
Daniel, Benjamin John.....	D. C.....	2441 K Street.
Farmer, James Price.....	D. C.....	154 A Street, N. E.
Flather, Alfred Chester.....	D. C.....	Amer. Security & Trust Co.
Hendley, Albert Julian.....	D. C.....	The New Berne.
Hoover, Frank Willard.....	D. C.....	1824 16th Street.
Koeppler, John Louis.....	Wis.....	The Virginia.
Landick, George, Jr.....	Ind.....	1358 Fairmont Street.
Lerch, John George.....	D. C.....	1520 M Street.
Manghum, James Mason.....	Md.....	1322 R. I. Avenue.

Name.	Legal residence.	City address.
Mathews, Roy Lee.....	Ohio.....	1700 15th Street.
Shrewsbury, Herman Douglass...	W. Va.....	717 19th Street.
Towles, Henry Orme.....	D. C.....	1124 12th Street.
Watson, Paul Herbert.....	Kans.....	1322 Kearney St., N. E.
Wilmer, Joseph Allison.....	Md.....	3117 N Street.
Winkelhaus, William August.....	D. C.....	4226 8th Street.

Review.

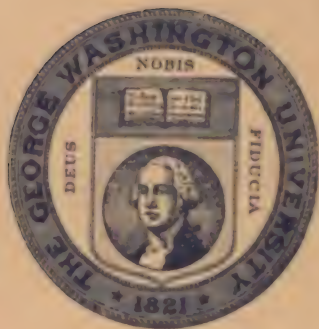
Blakesley, Raphael Henry.....	Calif.....	2517 14th Street.
LL.B., 1908, University of Southern California.		
LL.M., 1909, The George Washington University.		
Clark, Elmer A.....	D. C.....	514 F Street.
Cragin, Harry Seymour.....	D. C.....	1013 L Street.
B.A., 1907, LL.B., 1909, The George Washington University.		
James, Charles Grant.....	Ohio.....	1746 Columbia Road.
LL.B., 1905, The George Washington University.		
McNeal, Ira Bennett.....	Pa.....	1311 K Street.
A.B., 1898, Dickinson College.		
LL.B., 1908, The George Washington University.		
Oberlin, Stuart Earl.....	Md.....	344 D Street.
LL.B., 1902, Columbian University.		
Phillips, Ivon William.....	N. Y.....	3560 11th Street.
LL.B., 1908, The George Washington University.		
Powell, John Goodwin.....	Va.....	Cecil Apartments.
LL.B., 1908, National University Law School.		
M.P.L., 1909, The George Washington University.		
Wesseler, William Julius.....	D. C.....	908 S Street.
B.A., 1900, Washington University.		
LL.B., 1902, St. Louis Law School.		
LL.M., 1905, M.P.L., 1907, The George Washington University.		

Summary.

CANDIDATES FOR B.L. AND LL.B. DEGREES:	
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George Washington University
Bulletin

CATALOGUE NUMBER



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August, 1910

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GENERAL AND HISTORICAL.

1910.								1911.															
JULY.								JANUARY.								JULY.							
S.	M.	T.	W.	T.	F.	S.		S.	M.	T.	W.	T.	F.	S.		S.	M.	T.	W.	T.	F.	S.	
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3	4	5	6	7	8	9		8	9	10	11	12	13	14		2	3	4	5	6	7	8	
10	11	12	13	14	15	16		15	16	17	18	19	20	21		9	10	11	12	13	14	15	
17	18	19	20	21	22	23		22	23	24	25	26	27	28		16	17	18	19	20	21	22	
24	25	26	27	28	29	30		29	30	31		23	24	25	26	27	28	29	
31		30	31	
AUGUST.								FEBRUARY.								AUGUST.							
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14	15	16	17	18	19	20		12	13	14	15	16	17	18		13	14	15	16	17	18	19	
21	22	23	24	25	26	27		19	20	21	22	23	24	25		20	21	22	23	24	25	26	
28	29	30	31		26	27	28		27	28	29	30	31	
SEPTEMBER.								MARCH.								SEPTEMBER.							
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4	5	6	7	8	9	10		5	6	7	8	9	10	11		3	4	5	6	7	8	9	
11	12	13	14	15	16	17		12	13	14	15	16	17	18		10	11	12	13	14	15	16	
18	19	20	21	22	23	24		19	20	21	22	23	24	25		17	18	19	20	21	22	23	
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NOVEMBER.								MAY.								NOVEMBER.							
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27	28	29	30		28	29	30	31		26	27	28	29	30	
DECEMBER.								JUNE.								DECEMBER.							
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11	12	13	14	15	16	17		11	12	13	14	15	16	17		10	11	12	13	14	15	16	
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UNIVERSITY CALENDAR.

1910.

June 8, *Wednesday*.—University Commencement.

SUMMER VACATION.

September 28, *Wednesday*.—Academic Year begins in all Departments of the University.

October 12, *Wednesday*.—Stated meeting of the Board of Trustees.

October 19, *Wednesday*.—Fall Convocation.

October 20, *Thursday*.—Last day for registration for the first term without late-registration fee.

November 24-26, *Thursday to Saturday*, both inclusive.—Thanksgiving recess.

RECESS FROM DECEMBER 23, 1910, TO JANUARY 2, 1911, BOTH INCLUSIVE.

1911.

January 3, *Tuesday*.—Last day on which dissertations may be presented.

January 11, *Wednesday*.—Stated meeting of the Board of Trustees.

January 28, *Saturday*.—Mid-Year Examinations close.

January 30, *Monday*.—Doctorate Disputation.

January 30, *Monday*.—Second Term begins.

February 20, *Monday*.—Last day for registration for the second term without late-registration fee.

February 22, *Wednesday*.—Winter Convocation.

February 22, *Wednesday*.—Annual Meeting of the Alumni Association.

April 14-17, *Friday to Monday*, both inclusive.—Easter holidays.

April 18, *Tuesday*.—Davis Prize Speaking.

May 1, *Monday*.—Last day on which dissertations may be presented.

May 22, *Monday*.—Doctorate Disputation.

May 23-26, *Tuesday to Friday*.—Examinations for admission.

May 31, *Wednesday*.—Annual meeting of the Board of Trustees.

May 31, *Wednesday*.—Examinations close.

June 4, *Sunday*.—Baccalaureate Sermon.

June 7, *Wednesday*.—University Commencement.

SEC. 5. *And be it further enacted*, That the Head or Chief Master for the said College shall be called and styled "The President," and the Masters thereof shall be called "Professors and Tutors;" but neither President, Professors, or Tutors, while they remain such, shall ever be capable of the office of Trustee.

SEC. 6. *And be it further enacted*, That the President, Professors, and Tutors, or a majority of them, shall be called and styled "The Faculty of the College," which Faculty shall have the power of enforcing the rules and regulations adopted by the Trustees for the government of the pupils, by rewarding or censuring them, and, finally, by suspending such of them as after repeated admonitions shall continue disobedient and refractory, until a determination of a quorum of the Trustees can be had; and of granting and confirming, by and with the approbation and consent of a board of the Trustees, signified by their mandamus, such degrees in the liberal arts and sciences, to such pupils of the institution, or others, who, by their proficiency in learning, or other meritorious distinction, they shall think entitled to them, as are usually granted and conferred in colleges; and to grant, to such graduates, diplomas or certificates, under their common seal, and signed by the Faculty, to authenticate and perpetuate the memory of such graduation.

SEC. 7. *And be it further enacted*, That persons of every religious denomination shall be capable of being elected Trustees; nor shall any person, either as President, Professor, Tutor, or pupil, be refused admittance into said College, or denied any of the privileges, immunities, or advantages thereof, for or on account of his sentiments in matters of religion.

SEC. 8. *And be it further enacted*, That no misnomer of the said corporation shall defeat or annul any gift, grant, devise, or bequest, to or from the said corporation: *Provided*, The intent of the parties shall sufficiently appear upon the face of the gift, grant, will, or other writing, whereby any estate or interest was intended to pass to or from the said corporation.

SEC. 9. *And be it further enacted*, That the constitution of the said College, herein and hereby declared and established, shall be, and remain, the inviolate constitution of the said College forever; and the same shall not be altered, or alterable, by any ordinance or law of the said Trustees: *Provided*, That it may be lawful for the Congress of the United States to revoke and repeal this Act, at any and at all times whenever they shall think fit so to do.

SEC. 10. *And be it further enacted*, That it shall be the duty of the said Board of Trustees to keep a regular book or journal, in which shall be entered, under their direction, besides an account of all their ordinary acts and proceedings, all the by-laws, ordinances, rules, and regulations, which may be adopted by the said Board, for their own government, and for the government of the institution; also, a schedule of all the property and effects, real, personal, or mixed, which shall or may be vested in the said Trustees, for the use of the said College, by virtue of any gift, grant, bargain, sale, will, or otherwise, together with annual statements concerning the accounts and finances of the institution. That it shall, moreover, be the duty of the said Trustees, to cause to be enrolled, in the said book or journal, the names of all the contributors to the institution qualified to vote for Trustees, with their respective places of residence; and the said book or journal shall, at all times be open to the inspection or examination of the Attorney General of the United States; and, when required by either House of Congress, it shall be

the duty of said Trustees to furnish information respecting their own conduct, the state of the institution, and of its finances, which shall or may be so required.

SEC. 11. *And be it further enacted*, That in case any vacancy or vacancies shall happen in the Board of Trustees aforesaid by death, inability, resignation, or otherwise, at any time between the stated or triennial elections, that then it shall and may be lawful for the other Trustees, or any five of them, to proceed, at any subsequent meeting after the happening of such vacancy or vacancies, to choose, by ballot, any suitable person or persons to fill the same.

SEC. 12. *And be it further enacted*, That the employment or application of the funds or income of the said corporation, or any part thereof, for any purpose or object other than those expressed and defined in the first section of this Act, or the investment thereof in any other mode than is described and provided in the second section thereof, shall be deemed and taken to be a forfeiture of all the rights and immunities derived from this Act, and the same shall, thenceforth, cease and become null and void.

Approved, February 9, 1821.

By Act of Congress of July 14, 1832, there were donated to the Columbian College Washington city lots to the value of twenty-five thousand dollars; the Act providing that the fund arising from the proceeds of the sale of the lots should constitute an endowment fund for the support of professorships. By Act of February 28, 1839, permission was granted to the College to use seven thousand dollars of the fund for the payment of its debts.

By Act of Congress of February 21, 1871, a form of government by an elected Governor and Legislative Assembly was established for the District of Columbia, and on July 25, 1871, the Legislative Assembly passed the following statute:

An Act for the relief of the Columbian College, in the District of Columbia.

Be it enacted by the Legislative Assembly of the District of Columbia, That the Columbian College, in the District of Columbia, chartered by and organized and acting under the Act of Congress approved February nine, eighteen hundred and twenty-one, may, from the proceeds of any sale of its property, apply such sum as may be needful to pay its present indebtedness and place its libraries, buildings, and apparatus of instruction in good condition, and execute all deeds needful to quiet the title of property already sold.

SEC. 2. *And be it further enacted*, That the Trustees of said College elected in May last shall constitute the corporation of said College until their successors in office shall be chosen and qualified as hereinafter provided, and may, until then, as vacancies occur in their number, temporarily fill them by the election of fit persons residing in the District of Columbia.

SEC. 3. *And be it further enacted*, That the said Trustees shall meet in the Law Building of said College at noon, on the twenty-fifth day of June, eighteen hundred and seventy-two, for the purpose of choosing, and shall then and there, or at the time and place to which said meeting

may be adjourned, elect thirteen Trustees and thirteen Overseers, who shall, upon their election, constitute the College corporation, and they and their successors shall thenceforward be, and be known and recognized as, the Columbian College in the District of Columbia.

SEC. 4. *And be it further enacted*, That the Trustees chosen at the said meeting in June, eighteen hundred and seventy-two, or who may thereafter be chosen, shall be residents of the District of Columbia, and that at said meeting, and at any annual meeting of Trustees and Overseers to be thereafter held in said City of Washington on the Tuesday next preceding the last Wednesday in June, annually, the Trustees and Overseers in convention assembled shall fill vacancies in their Board, and shall, by ballot, elect from among the Trustees two suitable persons, one to be President and the other to be Treasurer and Secretary of said corporation and of the Board of Trustees, and shall establish ordinances and by-laws, or alter or repeal the same; and also frame laws and regulations for the College Faculty and students in all the departments thereof, and by ballot elect such teachers, tutors, professors, lecturers, and President, and with such salaries and duties as said corporation may deem proper.

SEC. 5. *And be it further enacted*, That at said annual meetings not less than seven Trustees and three Overseers shall constitute a quorum for the transaction of any business except adjournment, and adjournment may be made by any number present: *Provided*, That a final adjournment shall not be delayed beyond one week after the time fixed for the annual meeting.

SEC. 6. *And be it further enacted*, That during the interval between said annual meeting the Trustees shall, as now, hold semi-annual, quarterly, monthly, and occasional meetings to fill temporarily, as the case may require, vacancies in the Faculty or in their own Board, and with all their present powers as modified by this Act, subject to the ordinances and by-laws of the corporation; but no real estate or other property of said corporation shall, after the twenty-fifth day of June, eighteen hundred and seventy-two, be disposed of by the Trustees, except by vote of the corporation or in pursuance of its ordinances.

Approved, July 25, 1871.

This Act of the Legislative Assembly of the District was confirmed by Congress in 1873, and by the same statute the College was given the name of "the Columbian University." This Act was as follows:

An Act supplemental to the Act of February ninth, eighteen hundred and twenty-one, incorporating the Columbia[n] College, in the District of Columbia.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, That the act to incorporate the Columbia[n] College in the District of Columbia, approved February ninth, eighteen hundred and twenty-one, be, and the same is hereby, so modified that said corporation shall be hereafter known and called by the name of the Columbia[n] University, and in that name shall take, hold and manage all the estate and property now belonging to said College, or that may hereafter be conveyed, devised, or bequeathed to said corporation by its original name; that the restriction of the yearly value of the property of the said corporation to the sum

of twenty-five thousand dollars be, and the said restriction is hereby, repealed; and that said corporation may increase the number of its Overseers to twenty-one, and the number of its Trustees to twenty-one, exclusive of the President of the Faculty, who shall be, *ex officio*, a Trustee of said corporation.

SEC. 2. That the Act for the Relief of the Columbian College in the District of Columbia enacted by the Legislative Assembly of said District, and approved July twenty-fifth, eighteen hundred and seventy-one, be, and the same is hereby, approved and confirmed: *Provided*, That this Act nor the said Act of the Legislative Assembly of the said District, shall be so construed as to authorize the said Columbian University to sell, or use the proceeds of any sale of land granted by Congress to said institution for any purpose other than that expressed in the Act of Incorporation and the Act granting any such land or real estate, or contrary to any will, devise or grant of any land or real estate heretofore or hereafter made, by any person or persons to said institution.

Approved, March 3, 1873.

By the Act of Congress of May 31, 1878, it was provided that the annual meeting of the corporation might be held either in May or June, and by the Act of January 14, 1893, it was provided that the Secretary and the Treasurer might be elected from the Trustees or not, as the Board of Trustees might deem proper, and that it should not be necessary that both offices should be held by one person.

In 1898 Congress amended the charter by an Act as follows:

An Act supplemental to the Act of February ninth, eighteen hundred and twenty-one, incorporating the Columbian College in the District of Columbia, and the Acts amendatory thereof.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, That the Columbian University, on and after the first day of June, eighteen hundred and ninety-eight, shall be under the management and control of a Board of Trustees, consisting of twenty-two members; the President of the University shall be *ex officio* a member of said Board, and the remaining twenty-one shall be divided into three classes with seven members in each class; a majority of said Board shall be residents of the District of Columbia, and seven members shall constitute a quorum for the transaction of business. That on or before the thirty-first day of May, eighteen hundred and ninety-eight, a meeting of the Trustees and Overseers of said University shall be held, and said meeting shall elect twenty-one Trustees, seven of whom shall be designated to serve from the first day of June, eighteen hundred and ninety-eight, until the annual meeting in eighteen hundred and ninety-nine; and seven from the same date until the annual meeting in nineteen hundred; and seven until the annual meeting in nineteen hundred and one. Two-thirds of said Trustees, and also the President of the University, shall be members of regular Baptist churches; that is to say, members of churches of that denomination of Protestant Christians now usually known and recognized under the name of the regular Baptist denomination; said Trustees so elected shall serve for the periods mentioned and until their successors are elected.

That on the first day of June, eighteen hundred and ninety-eight, the terms of office of the present Trustees and Overseers shall cease and determine, and thereupon the control and management of said University, its property and trusts, shall vest in the Board of Trustees elected as hereinabove provided and their successors.

SEC. 2. That at the annual meeting in eighteen hundred and ninety-nine, and annually thereafter, there shall be elected by the Board of Trustees seven Trustees to fill the places of the class whose terms of office expire; and the Board of Trustees may prescribe in a by-law the mode of nominating persons for election as Trustees. A failure to elect Trustees at the annual meeting shall not create vacancies in the Board, but such election may be had and vacancies occurring during the year may be filled for the unexpired term by the Board at any general or special meeting.

SEC. 3. That the Board of Trustees provided for herein shall have, and they are hereby given, full power and authority to appoint and remove any and all officers, professors, lecturers, teachers, tutors, agents, and employees who are now or may hereafter be elected or appointed; they may, by a vote of two-thirds of all the Trustees constituting said Board, adopt and change by-laws for the conduct of the business and educational work of said University; they may appoint an Executive Committee composed of Trustees, designate the number and Chairman thereof, with such powers and authority as are usually exercised by an Executive Committee, and which shall be conferred by the Board, subject always to the control of the Board of Trustees; they may create and establish schools and departments of learning to be connected with and become a part of said University; they may receive, invest, and administer endowments and gifts of money and property for the maintenance of educational work by said University, and by any department and chair thereof now established or which may hereafter be created or established by said University; and they shall have all the powers and authority heretofore granted to and vested in the Trustees and Overseers of said University.

SEC. 4. That the annual meeting of the Board of Trustees shall be held in the City of Washington, District of Columbia, on the Wednesday nearest the first day of June in each year; two other stated meetings shall be held on the second Wednesday of October and January in each year, and special meetings may be called by the President of the University or by the Executive Committee or by seven members of the Board of Trustees upon such notice and at such hour and place as may be designated in the by-laws; at all meetings any business necessary to be transacted may be considered and acted upon, and any meeting may be adjourned from time to time by the Trustees present, whether constituting a quorum or not, notice of such adjournment to be given, as of called meetings, to those Trustees not present.

SEC. 5. That the terms of office of the President of the University, the Treasurer and other officers, professors, and lecturers, and the employment of agents and employees, and the title to all the property and rights in and management of the endowment funds of the University shall not be affected by the change of management herein provided for, but they shall continue and be subject to the control and management of the Board of Trustees hereby created the same as they are now subject to the control and management of the corporation.

SEC. 6. That all acts and parts of acts inconsistent with the provisions of this Act are hereby repealed.

Approved, March 18, 1898.

In 1904 Congress passed an Act restoring the non-denominational character of the institution and permitting the change of its name. This Act and the certificate of change of name, were as follows:

An Act supplemental to the Act of February ninth, eighteen hundred and twenty-one, incorporating the Columbian College in the District of Columbia, and the Acts amendatory thereof.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, That the Act to incorporate the Columbian College, in the District of Columbia, approved February ninth, eighteen hundred and twenty-one, and the amendatory Act approved March eighteenth, eighteen hundred and ninety-eight, be, and the same are hereby, amended by repealing and striking out of the said charter the following words in lines twenty to twenty-five in section one of the said amendatory Act of March eighteenth, eighteen hundred and ninety-eight, namely, "Two-thirds of said Trustees, and also the President of the University, shall be members of regular Baptist churches; that is to say, members of churches of that denomination of Protestant Christians now usually known and recognized under the name of the regular Baptist denomination."

SEC. 2. That section thirteen of the original charter of February ninth, eighteen hundred and twenty-one, which provides "That persons of every religious denomination shall be capable of being elected Trustees; nor shall any person, either as President, Professor, Tutor or pupil, be refused admittance into said College, or denied any of the privileges, immunities, or advantages thereof, for or on account of his sentiments in matters of religion," be, and the same is hereby, re-enacted and shall be hereafter in full force as a part of said charter.

SEC. 3. That power is hereby given to the Board of Trustees of said University to change the name of said University at any regular meeting by a vote of not less than two-thirds of the total number of members of the Board, as prescribed by the charter, subject to the approval of the Secretary of the Interior and the Commissioner of Education. That upon said action being taken a certificate, under the seal of the University, stating the name adopted and the date when the name shall go into effect not less than thirty days nor more than six months from the date of its adoption, together with the fact that said name has been adopted as herein prescribed, shall be filed in the office of the Recorder of Deeds of the District of Columbia, and thereupon, upon the date specified for the name to go into effect, the University shall be known and designated by the name adopted, and by said new name the said University shall be vested with and convey its real estate, hold, control, and administer endowments and gifts of money and property heretofore and hereafter made for the maintenance of its educational work, and do and perform all acts which it now has the power to do under its said charter. Such change of name shall not in any other way change, affect, or modify in any degree the rights, privileges, obligations, and powers of the said University under the charter of February ninth, eighteen hundred and twenty-one, and the amendatory Acts thereto.

SEC. 4. That all Acts and parts of Acts inconsistent with this Act are hereby repealed.

Approved, January 23, 1904.

Certificate of Change of Name of the Columbian University to
"The George Washington University."

DISTRICT OF COLUMBIA,
City of Washington:

The Columbian University, in accordance with the Act of Congress approved January 23, 1904, does hereby certify that, at the regular meeting of its Board of Trustees, duly held on the eighth day of June, 1904, at which meeting there were present more than two-thirds of the total number of members of the Board, it was unanimously resolved that, subject to the approval of the Secretary of the Interior and the Commissioner of Education, prescribed by said Act of Congress, the name of this University be changed to that of The George Washington University, the same to go into effect on the first day of September, A. D. 1904.

And it is hereby further certified, that on the twentieth day of June, A. D. 1904, the Secretary of the Interior and the Commissioner of Education duly approved in writing said change of name, which said written approval is hereto attached and made a part hereof.

In testimony whereof, said Columbian University has given this its certificate under its corporate seal, at the City of Washington, D. C., on the twenty-first day of June, A. D. 1904.

Attest:

JOHN B. LARNER,
Secretary.

(Corporate Seal.)

CHARLES W. NEEDHAM,
President.

UNITED STATES OF AMERICA,
DEPARTMENT OF THE INTERIOR,
WASHINGTON, D. C., June 20, 1904.

Pursuant to section 882 of the Revised Statutes, I hereby certify that the annexed paper is a true copy of the original as it appears upon the files of the Department.

In testimony whereof, I have hereunto subscribed my name, and caused the seal of the Department of the Interior to be affixed, the day and year first above written.

E. A. HITCHCOCK,
Secretary of the Interior.
W. B. A.

(Seal of the Department of the Interior.)

Whereas by Act of Congress approved January 23, 1904, the Columbian University was authorized to change its name, subject to the approval of the Secretary of the Interior and the Commissioner of Education;

And whereas it has been made satisfactorily to appear to us that, at the regular meeting of the Board of Trustees of said University, held on the eighth day of June, A. D. 1904, at which meeting there were present more than two-thirds of the total number of members of said Board, it was unanimously resolved to change the name of said University to that of The George Washington University, the same to go into effect on the first day of September, A. D. 1904;

Now, therefore, this is to witness that, pursuant to said Act of Congress, we do hereby, this twentieth day of June, A. D. 1904, approve said change of name.

E. A. HITCHCOCK,
Secretary of the Interior.
W. T. HARRIS,
Commissioner of Education.

(Seal of the Department of the Interior.)

In 1905 a further amendment to the charter was made, as follows:

An Act supplemental to the Act of February ninth, eighteen hundred and twenty-one, incorporating the Columbian College in the District of Columbia, and the Acts amendatory thereof.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, That The George Washington University shall have, and is hereby given, power to increase the number of its Trustees from time to time, by a two-thirds vote of the whole number of the Trustees at the time such vote is taken, to a number not exceeding forty-five. In case of the increase of the number of Trustees a certificate, stating the number of the Board and the time when it shall go into effect and that the action so taken was by a two-thirds vote as required by this Act, shall be filed with the Recorder of Deeds of the District of Columbia, and upon and after the date named the Board shall consist of the number of Trustees stated in such certificate, and said Board may also appoint a Board or Boards of Visitors for any department or departments of educational work carried on by the University, such Boards of Visitors to be advisory only.

SEC. 2. That by and with the consent of said University, Colleges may be organized hereunder for the purpose of carrying on, in connection with the University, special lines of educational work in the arts, sciences, and liberal and technical knowledge, such Colleges to be educationally a part of the system of the University, but upon independent financial foundations, and to this end any five or more persons desirous of associating themselves for the purpose of establishing a College hereunder, may make, sign, and acknowledge before any officer authorized to take acknowledgment of deeds in the District of Columbia, and with the assent of the University in writing, file in the office of the Recorder of Deeds of the said District a certificate in writing, in which shall be stated: First, the intention to organize a corporation under this Act and the assent of the University thereto; second, the name or title by which the College shall be known in law; third, the names of the Trustees constituting the first Board, and such Trustees may be divided into three classes, the term of office of one class expiring annually; fourth, the manner of nominating and electing successors to said Trustees; fifth, the branch or branches of literature, arts, sciences, liberal or technical knowledge proposed to be taught; sixth, that the highest officer of said College shall be a Dean, the Dean and members of the Faculty to be members of the Educational Councils of the University in accordance with the rules governing the University; seventh, that all degrees shall be bestowed by the

University; eighth, that in all financial and legal responsibility the College shall be an independent organization. Upon filing such certificate the Trustees named therein and their successors shall be a body politic, incorporated by the name and style stated in the certificate, and by that name and style shall have perpetual succession in association with the University, with power in the College to sue and be sued; plead and be impleaded; to acquire, hold, and convey property in all legal ways; to receive by gift, devise, or otherwise, and hold, control, and administer endowments and gifts of money and property thereafter made to it for the maintenance of its educational work; to have and use a common seal, and to alter and change the same at pleasure; to make and alter from time to time such by-laws, not inconsistent with the Constitution of the United States or the laws in force in said District or the laws of the University regulating the conduct of educational work, as may be deemed necessary for the government of the College, but said College shall not confer academic or honorary degrees; such College shall hold the property of the institution and all moneys and property conveyed to it by purchase, gift, conveyance, will, devise, or bequest solely for the purposes of the educational work specified in said certificate; the Trustees of such College shall faithfully apply all funds collected or received and the proceeds thereof belonging to the institution, according to their best judgment, in purchasing lands and erecting buildings, supporting necessary officers, instructors, and servants, and procuring all equipment, educational and otherwise, necessary to carry on the work of the College.

SEC. 3. That said University may enter into affiliated agreements with any institutions of learning outside of the District of Columbia, for the purpose of giving to students of such institutions the educational facilities of said University and the Departments of the Government in the City of Washington which are by law open to students, upon such terms as are mutually agreed upon by the said University and the affiliated institutions.

Approved, March 3, 1905.

Under section 2 of this amendment, two Colleges have been organized to carry on educational work forming a part of the regular undergraduate curriculum—The Columbian College and The Washington College of Engineering. This new Columbian College was first organized in 1904,—contemporaneously with the change of name of the University—under the general educational incorporation act of the District. In 1905, the new Columbian College was reincorporated under section 2 of the amendment of 1905. The new Columbian College and the Washington College of Engineering have always remained inactive, and have been in fact superseded by the establishment of the College of Arts and Sciences and the College of Engineering and Mechanic Arts, which are Departments of the University.

Under section 2 of the Act of 1905, there now exist two colleges which are doing special educational work and which are in active operation—the National College of Pharmacy, organized in 1905, and the College of Veterinary Medicine, organized in 1908. The financial

affairs of these Colleges are separate from those of the University, and are managed by their separate Boards of Trustees. The Faculties of these Colleges are also appointed by their respective Boards of Trustees. The connection between these Colleges and the University consists in the fact that their Deans are members of the President's Council; that their Deans and the members of their Faculties are members of the University Council, and that the Board of Trustees of the University confers degrees for the work done in these Colleges.

By resolutions of the Board of Trustees of the University of May 6, 1909, and January 12, 1910, provision was made for the nomination by the Alumni of two Alumni Trustees each year. In the spring of 1910, this plan was put in operation, and the two persons nominated as Alumni Trustees were at the meeting of the Board of Trustees on June 7, 1910, elected to membership on the Board.

THE BOARD OF TRUSTEES.

CHARLES HERBERT STOCKTON, LL.D.,
Acting President of the University.

1911.

THOMAS H. ANDERSON, A.B., 1531 New Hampshire Avenue, N. W.
HARRY C. DAVIS, A.B., LL.D., 1006 Massachusetts Avenue, N. W.
WILLIAM J. FLATHER, Riggs National Bank.
WILLIAM D. HOOVER, LL.M., National Savings & Trust Company.
JOHN B. LARNER, LL.B., LL.D., 900 F Street, N. W.
HENRY B. F. MACFARLAND, 1420 New York Avenue, N. W.
WILLIAM H. SINGLETON, A.B., 2020 H Street, N. W.

1912.

LEWIS FLEMER, Phar.D., 701 Maryland Avenue, N. E.
ABRAM LISNER, 1723 Massachusetts Avenue, N. W.
THEODORE W. NOYES, A.M., LL.M., 1101 Pennsylvania Avenue, N. W.
HENRY C. PERKINS, 1701 Connecticut Avenue, N. W.
PRESLEY M. RIXEY, M.D., Surgeon General U. S. N. (retired),
1518 K Street, N. W.
ALPHEUS H. SNOW, A.B., LL.B., 2013 Massachusetts Avenue, N. W.
CHARLES H. STOCKTON, LL.D., Rear Admiral U. S. N. (retired),
2019 O Street, N. W.

1913.

ALDIS B. BROWNE, LL.B., 1419 F Street, N. W.
*JOHN JOY EDSON, LL.B., Washington Loan & Trust Company.
WILLIAM W. FINLEY, LL.D., 1300 Pennsylvania Avenue, N. W.
EDWARD M. GALLAUDET, S.B., Ph.D., LL.D., Kendall Green.
SAMUEL H. GREENE, A.M., D.D., LL.D., 1320 Q Street, N. W.
ARCHIBALD HOPKINS, A.M., LL.B., 1826 Massachusetts Avenue, N. W.
*AUGUSTUS S. WORTHINGTON, LL.B., 416 Fifth Street, N. W.

* Nominated by the Alumni.

Chairman of the Board of Trustees,

HENRY B. F. MACFARLAND.

Vice-Chairman of the Board of Trustees,

EDWARD M. GALLAUDET.

Executive Committee of the Board of Trustees.

ALPHEUS H. SNOW, *Chairman.*

WILLIAM J. FLATHER.

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JOHN B. LARNER.

WILLIAM H. SINGLETON.

CHARLES H. STOCKTON.

AUGUSTUS S. WORTHINGTON.

HARRY C. DAVIS, *Secretary of the University.*

CHARLES W. HOLMES, *Treasurer of the University.*

WILLIAM A. DE CAINDRY, *Auditor of the University.*

Professors and Assistant Professors in all Departments and Colleges of the University and in the Associated Colleges constitute the University Council.

(Arranged, with the exception of the President, in groups, in the order of appointment.)

Professors.

- J. FORD THOMPSON, M.D. Professor of Surgery, Emeritus
ALBERT F. A. KING, A.M., M.D., LL.D. Professor of Obstetrics,
and Dean Emeritus of the Faculty of Medicine
THEODORE NICHOLAS GILL, M.D., Ph.D., LL.D. Professor of Zoölogy,
Emeritus
GEORGE N. ACKER, A.M., M.D. Professor of Pediatrics and
of Clinical Medicine
HOWARD LINCOLN HODGKINS, Ph.D. Professor of Mathematics,
and Dean
HENRY CRÉCY YARROW, M.D. Professor of Dermatology
D. KERFOOT SHUTE, A.B., M.D. Professor of Anatomy, Emeritus,
and Clinical Professor of Ophthalmology
HENRY CLAY THOMPSON, D.D.S. Professor of Operative Dentistry
HERMANN SCHOENFELD, Ph.D., LL.D. Professor of German
STERLING RUFFIN, M.D. Professor of Medicine
CHARLES EDWARD MUNROE, Ph.D. Professor of Chemistry, and Dean
GEORGE P. MERRILL, Ph.D. Professor of Geology and Mineralogy
CHARLES W. RICHARDSON, M.D. Professor of Laryngology, Rhinology
and Otology
FRANK WIGGLESWORTH CLARKE, Sc.D. Professor of Mineral Chemistry
HARVEY WASHINGTON WILEY, Ph.D., M.D. Professor of Agricultural
Chemistry
MELVILLE CHURCH, LL.M. Professor of the Law of Patents
WILLIAM ALLEN WILBUR, A.M. Professor of English, and Dean
J. WESLEY BOVEE, M.D. Professor of Gynecology
THOMAS A. CLAYTOR, M.D. Clinical Professor of Medicine
A. R. SHANDS, M.D. Professor of Orthopedic Surgery
CHARLES CLINTON SWISHER, Ph.D., LL.D. Professor of History
RANDOLPH B. CARMICHAEL, M.D. Clinical Professor of Dermatology
FRANCIS R. HAGNER, M.D. Professor of Genito-Urinary Surgery
and Venereal Diseases
WALTER C. CLEPHANE, LL.M. Professor of Law
PAUL BARTSCH, Ph.D. Professor of Zoölogy

*NOTE.—For the names of the members of the Faculties and Teaching Staff of the Associated Colleges, see part III of this catalogue.

EDWIN C. BRANDENBURG, LL.M.....	Professor of Law
ARTHUR PETER, LL.M.....	Professor of Law
W. C. WOODWARD, M.D., LL.M.....	Professor of Medical Jurisprudence
ALBERT L. STAVELY, M.D.....	Clinical Professor of Gynecology
STANTON J. PEELE, LL.D.....	Professor of Law
GEORGE N. HENNING, A.M.....	Professor of Romance Languages
JOHN PAUL EARNEST, A.M., LL.M.....	Professor of Law
J. ROLAND WALTON, D.D.S.....	Professor of Prosthetic Dentistry and Orthodontia, and Dean
WILLIAM A. WHITE, M.D.....	Professor of Psychiatry, and Clinical Professor of Neurology
ERNEST G. LORENZEN, Ph.B., LL.B., J.U.D..	Professor of Law, and Dean
WILLISTON S. HOUGH, Ph.M.....	Professor of Philosophy, and Dean
GEORGE M. STERNBERG, Surgeon-General, U.S.A. (retired),	Professor of Preventive Medicine
JAMES BROWN SCOTT, M.A., J.U.D.....	Professor of International Law
ASAPH HALL, JR., Ph.D.....	Professor of Astronomy
ARTHUR A. SNYDER, M.D.....	Clinical Professor of Surgery
I. W. BLACKBURN, M.D.....	Professor of Morbid Anatomy
ALBERT MANN, A.M., Ph.D.....	Professor of Botany
SHEPHERD IVORY FRANZ, Ph.D.....	Professor of Physiology and Experimental Psychology
HENRY PARKER WILLIS, Ph.D.....	Professor of Finance, and Dean
CHARLES SIDNEY SMITH, Ph.D.....	Professor of Greek and Latin
WENDELL P. STAFFORD, LL.D.....	Professor of Law
JOSIAH A. VAN ORSDEL, LL.D.....	Professor of Law
WILLIAM CLINE BORDEN, M.D., U.S.A. (retired) ..	Professor of Surgery, and Dean
JOHN R. WELLINGTON, M.D.....	Clinical Professor of Surgery
CHARLES S. WHITE, M.D.....	Professor of Oral Surgery
HURON W. LAWSON, M.D.....	Professor of Histology and Embryology and Associate in Surgery
D. WEBSTER PRENTISS, M.D.....	Professor of Hygiene
WILLIAM K. BUTLER, A.M., M.D.....	Professor of Ophthalmology
FREDERICK FULLER RUSSELL, M.D.....	Professor of Pathology and Bacteriology
W. O. OWEN, M.D.....	Professor of Anatomy
B. M. RANDOLPH, M.D..	Professor of Materia Medica and Therapeutics
CHARLES S. BUTLER, M.D.....	Professor of Tropical Diseases
LUTHER H. REICHELDERFER, M.D.....	Clinical Professor of Surgery

Associate Professors.

- J. R. DEFARGES, M.D....Associate Professor of Metallurgy, Professional Ethics, Dental Jurisprudence and Economics
- CHARLES T. BASSETT, D.D.S.....Associate Professor in Charge of Dental Infirmary
- ALLEN S. WOLFE, D.D.S.....Associate Professor of Crown and Bridge Work and Porcelain
- CADMUS LINDEN ODOR, D.D.S.....Associate Professor of Operative Technics and Comparative Anatomy
- W. FRANCIS LAWRENCE, D.D.S.....Associate Professor of Prosthetic Technics
- JAMES DUDLEY MORGAN, A.B., M.D....Associate Professor of Medicine, and Clinical Professor of Medicine
- NOBLE P. BARNES, M.D.....Associate Professor of Materia Medica and Therapeutics, and Clinical Associate in Medicine
- CHARLES FRANKLIN CRAIG, M.D.....Associate Professor of Pathology and Bacteriology

Assistant Professors.

- EDWARD G. SEIBERT, M.D.....Assistant Professor in Chemistry and Instructor in Ophthalmology
- NEVIL MONROE HOPKINS, Ph.D.....Assistant Professor of Chemistry
- †PHILANDER BETTS, E.E....Assistant Professor of Electrical Engineering
- EDWIN A. HILL, Ph.D.....Assistant Professor of Chemistry
- THOMAS MALCOLM PRICE, Ph.D.....Assistant Professor of Chemistry
- RAY SMITH BASSLER, Ph.D.....Assistant Professor of Geology
- †DE WITT C. CROISSANT, A.B.....Assistant Professor of English
- ALFRED F. W. SCHMIDT, A.M.....Assistant Professor of German, and Librarian
- WILLIAM CARL RUEDIGER, Ph.D....Assistant Professor of Educational Psychology
- PERLEY G. NUTTING, Ph.D.....Assistant Professor of Physics
- EDWIN V. DUNSTAN, C.E....Assistant Professor of Civil Engineering
- OSCAR A. MECHLIN, C.E.....Assistant Professor of Civil Engineering
- †JAMES FREDERICK PEAKE, A.M.....Assistant Professor of History
- HARRIES ARTHUR MUMMA, A.B., LL.B....Assistant Professor of Law
- JOHN WILMER LATIMER, LL.B.....Assistant Professor of Law
- OTIS D. SWETT, M.S., LL.M.....Assistant Professor of Chemistry
- CHARLES W. MORTIMER, B.S., M.E....Assistant Professor of Electrical Engineering
- F. CHARLES STARR, S.B.....Assistant Professor of Civil Engineering
- BLAINE F. MOORE, A.B.....Assistant Professor of Political Science
- EVERETT FRASER, A.B., LL.B.....Assistant Professor of Law

†Absent on leave.

Associates, Instructors, Demonstrators and Assistants.

JOHN B. NICHOLS, M.D.....	Associate in Medicine
EDWARD E. MORSE, M.D.....	Associate in Obstetrics
JULIAN M. CABELL, M.D.....	Associate in Obstetrics
C. S. WHITE, M.D.....	Associate in Surgery
H. H. DONNALLY, A.M., M.D.....	Associate in Medicine
F. FREMONT-SMITH, M.D.....	Associate in Pediatrics
W. F. M. SOWERS, A.B., M.D.....	Associate in Surgery
G. BROWN MILLER, M.D.....	Associate in Gynecology
HENRY R. ELLIOTT, M.D....	Associate in Physiology and Pharmacology
W. R. BRANDENBURG, M.D....	Associate in Bacteriology and Pathology
EDGAR P. COPELAND, M.D.....	Clinical Associate in Pediatrics
J. T. KELLEY, M.D.....	Clinical Associate in Obstetrics
W. A. FRANKLAND, M.D.....	Clinical Associate in Medicine
EDWARD G. SEIBERT, M.D....	Associate in Chemistry and in Laryngology and Ophthalmology
J. L. RIGGLES, M.D.....	Associate in Anatomy and Gynecology
HENRY J. NICHOLS, M.D.....	Associate in Bacteriology and Pathology
JOHN SWEYN NEATE, M.D.....	Associate in Pathology and Bacteriology
W. WILKINSON, M.D.....	Associate in Medicine
SAMUEL H. GREENE, JR., M.D.....	Instructor in Anatomy
HOMER S. MEDFORD, M.D.....	Instructor in Obstetrics
WATER H. MERRILL, M.D.....	Instructor in Electro-Therapeutics
O. A. M. MCKIMMIE, M.D....	Instructor in Laryngology and Otology
H. S. DYE, M.D.....	Instructor in Laryngology and Otology
TRUMAN ABBE, M.D.....	Instructor in Surgery
J. LAWN THOMPSON, M.D.....	Instructor in Surgery
ALFRED G. BUHRMAN.....	Clerk of the Moot Court
GEORGE MORTON CHURCHILL, A.M.....	Instructor in History
VERGIL B. JACKSON, M.D.....	Instructor in Gynecology
E. T. M. FRANKLIN, M.D.....	Instructor in Surgery
W. J. FRENCH, M.D.....	Instructor in Pediatrics
A. L. HUNT, M.D.....	Instructor in Minor Surgery
CHARLES W. HYDE, M.D.....	Instructor in Medicine
E. P. MAGRUDER, A.M., M.D.....	Instructor in Anatomy
DANIEL T. BIRTWELL, M.D.....	Instructor in Anatomy
JOHN WINSLOW TAYLOR, D.D.S....	Instructor in Prosthetic Technics
ADAM KEMBLE, M.D.....	Instructor in Gynecology
SOTHORON KEY, M.D.....	Instructor in Medicine
H. G. FULLER, M.D.....	Instructor in Genito-Urinary Surgery and Venereal Diseases
CLARA S. LUDLOW, M.D.....	Instructor in Histology and Embryology
ROBERT R. KERN, A.B.....	Instructor in Economics

C. G. SHOEMAKER, D.D.S.	Instructor in Operative Technics
HENRY CISSEL YOUNG, D.D.S.	Instructor in Prosthetic Technics
HERRBERT C. HOPKINS, D.D.S.	Instructor in Orthodontia Technics
HAYNER H. GORDON, E.E.	Instructor in Mechanical Engineering
ROBERT W. MORSE, S.B.	Instructor in Mechanical Engineering
H. F. A. SCHOENFELD, A.M.	Instructor in History
CLINE CHIPMAN, M.D.	Instructor in Minor Surgery
T. FRANCIS SMITH, M.D.	Instructor in Medicine
GEORGE H. SCHWINN, M.D.	Instructor in Psychiatry and Neurology
HARRY W. MILLER, M.D.	Instructor in Psychiatry and Neurology
B. R. LOGIE, M.D.	Instructor in Neurology
JOHN P. FILEBROWN, M.D.	Instructor in Physiology
HENRY I. STOUT, M.D.	Instructor in Anatomy
MARK R. WOODWARD, E.E.	Instructor in Electrical Engineering
LESLIE CLEVELAND McNEMAR, A.B.	Instructor in Political Science and International Law
JOSEPH RYLAND CURL, B.S.	Secretary of the Department of Law
EWING MARVIN WOOD BEAR, D.D.S.	Demonstrator in the Dental Infirmary
MELVILLE P. ESLIN, D.D.S.	Demonstrator in the Dental Infirmary
JAMES N. ROBINSON, D.D.S.	Demonstrator in the Dental Infirmary
W. R. JOHNSON, M. D.	Resident Physician, University Hospital
J. N. NEVILLE, M.D.	Assistant Resident Physician, University Hospital
F. P. MACHLER, M.D.	Assistant Resident Physician, University Hospital
G. P. DAVIS, M.D.	Assistant Resident Physician, University Hospital
G. A. SCHAUB.	Pharmacist, University Hospital

Lecturers.

FREDERICK E. FOWLE, JR., S.B.	Lecturer on Astro-Physics
WILLIAM HAMILTON, Ph.D.	Lecturer on History
WILLARD S. SMALL, Ph.D.	Lecturer on Education
STEPHEN ELLIOTT KRAMER, B.S., A.M.	Lecturer on Education
JOHN BALL OSBORNE, M.A.	Lecturer on the Consular Service
PAUL CHARLTON.	Lecturer on Colonial Administration
JULIAN GARTRELL, D.D.S.	Lecturer on Oral Prophylaxis
W. B. HOOFNAGLE, D.D.S.	Lecturer on Materia Medica
JOHN L. COULTER, M.A.	Lecturer on Economics
M. J. FINLEY, D.D.S.	Special Lecturer, Dental Department
A. D. COHEY, D.D.S.	Special Lecturer, Dental Department
ROBERT E. LAYTON, D.D.S.	Special Lecturer, Dental Department
GEORGE M. SHARP, D.D.S.	Special Lecturer, Dental Department

EDUCATIONAL ORGANIZATION.

The University embraces:

THE DEPARTMENT OF ARTS AND SCIENCES.

The Faculty of Graduate Studies.
The College of Arts and Sciences.
The College of Engineering and Mechanic Arts.
The College of the Political Sciences.
The Teachers College.

THE PROFESSIONAL DEPARTMENTS.

The Department of Law.
The Department of Medicine.
The Department of Dentistry.

THE ASSOCIATED COLLEGES.

National College of Pharmacy.
The College of Veterinary Medicine.

ANNUAL COMMENCEMENT AND FALL AND WINTER CONVOCATIONS.

The Annual Commencement is held on the second Wednesday in June. The Fall Convocation is held on the third Wednesday in October. The Winter Convocation is held on the 22d of February. Degrees are publicly conferred on Commencement Day and at the Fall and Winter Convocations.

THE UNIVERSITY LIBRARY.

The University Library comprehends (1) the Library of the Department of Arts and Sciences, (2) the Law Library, (3) the Medical Library, and (4) the Library of the College of the Political Sciences. It contains over 42,000 volumes.

In addition to its general collections the Library of the Department of Arts and Sciences contains the library of the late Professor Richard Heinzel, of the University of Vienna, containing 7,200 books and pamphlets in Germanic philology and literature, and cognate branches; the Library of the late Professor Curt Wachsmuth, of the University of Leipzig, containing 7,900 books and pamphlets in Greek and Roman literature, archæology, and history; and the divisional collections in engineering and mechanic arts and in education. It is open from 9 a. m. to 6.30 p. m.

The Law Library, containing 5,300 volumes, is open from 9 a. m. to 10 p. m.

The Medical Library, containing 4,000 volumes, is open from 9 a. m. to 10.30 p. m.

The Library of the College of the Political Sciences, containing 4,000 volumes in political history, international law, and the social sciences, is open from 9 a. m. to 10 p. m.

PRIVILEGES IN GOVERNMENTAL INSTITUTIONS OPEN TO UNIVERSITY STUDENTS.

In order to promote research and the diffusion of knowledge, the Congress of the United States has made the scientific resources of the Government accessible to students under the terms of the following joint resolution, approved April 12, 1892:

"Resolved by the Senate and House of Representatives of the United States of America in Congress assembled, That the facilities for research and illustration in the following and any other governmental collections now existing or hereafter to be established in the city of Washington for the promotion of knowledge shall be accessible, under such rules and restrictions as the officers in charge of each collection may prescribe, subject to such authority as is now or may hereafter be permitted by law, to the scientific investigators and to students of any institution of higher education now incorporated or hereafter to be incorporated under the laws of Congress or of the District of Columbia, to wit:

1. Of the Library of Congress.
2. Of the National Museum.
3. Of the Patent Office.
4. Of the Bureau of Education.
5. Of the Bureau of Ethnology.
6. Of the Army Medical Museum.
7. Of the Department of Agriculture.
8. Of the Fish Commission.
9. Of the Botanic Gardens.
10. Of the Coast and Geodetic Survey.
11. Of the Geological Survey.
12. Of the Naval Observatory."

PART II.
DEPARTMENTS OF THE UNIVERSITY.

Department of Arts and Sciences.

The Department of Arts and Sciences is organized as follows:

THE FACULTY OF GRADUATE STUDIES

Offers graduate seminary, laboratory, and lecture courses leading to the master's degrees, the engineering degrees (C.E., E.E., M.E.), and the degrees of Doctor of Jurisprudence and Doctor of Philosophy.

THE FACULTY OF UNDERGRADUATE STUDIES

Offers undergraduate courses in arts, philosophy, and science, in the following colleges and divisions:

College of Arts and Sciences.
College of Engineering and Mechanic Arts.
College of the Political Sciences.
Teachers College.

FACULTY OF GRADUATE STUDIES

CHARLES H. STOCKTON, LL.D....ACTING PRESIDENT OF THE UNIVERSITY
HOWARD LINCOLN HODGKINS, Ph.D.....Professor of Mathematics
HERMANN SCHOENFELD, Ph.D.....Professor of German
CHARLES E. MUNROE, Ph.D.....Professor of Chemistry, and Dean
CHARLES CLINTON SWISHER, Ph.D., LL.D.....Professor of History
WILLIAM ALLEN WILBUR, A.M.....Professor of English
GEORGE N. HENNING, A.M.....Professor of Romance Languages
*THEODORE N. GILL, Ph.D.....Professor of Zoölogy, Emeritus
*FRANK W. CLARKE, Sc.D.....Professor of Mineral Chemistry
*HARVEY W. WILEY, Ph.D.....Professor of Agricultural Chemistry
*GEORGE P. MERRILL, Ph.D.....Professor of Geology and Mineralogy
*PAUL BARTSCH, M.S., Ph.D.....Professor of Zoölogy
WILLISTON S. HOUGH, Ph.M.....Professor of Philosophy
*GEORGE M. STERNBERG, M.D., LL.D., Surgeon-Gen. U.S.A....Professor
of Preventive Medicine
*ASAPH HALL, JR., Ph.D.....Professor of Astronomy
*SHEPHERD IVORY FRANZ, Ph.D.. Professor of Experimental Psychology
*HENRY PARKER WILLIS, Ph.D.....Professor of Finance
*ALBERT MANN, A.M., Ph.D.....Professor of Botany

* Giving part time to teaching in the University.

† Absent on leave.

ERNEST G. LORENZEN, Ph.B., J.U.D.....	Professor of Law
CHARLES SIDNEY SMITH, Ph.D.....	Professor of Greek and Latin
*N. MONROE HOPKINS, Ph.D.....	Assistant Professor of Chemistry
*EDWIN A. HILL, Ph.D.....	Assistant Professor of Stereo-Chemistry
†PHILANDER BETTS, M.S., E.E.....	Assistant Professor of Electrical Engineering
ALFRED F. W. SCHMIDT, A.M.....	Assistant Professor of German
EDWIN DUNSTAN, C.E.....	Assistant Professor of Civil Engineering
OSCAR A. MECHLIN, C.E.....	Assistant Professor of Civil Engineering
WILLIAM C. RÜDIGER, Ph.D.....	Assistant Professor of Educational Psychology
PERLEY G. NUTTING, Ph.D.....	Assistant Professor of Physics
*FREDERICK E. FOWLE, JR., S.B.....	Lecturer on Astro-Physics
†HARRY CASSELL DAVIS, L.H.D.....	Secretary

The Faculty of Graduate Studies is charged with the development and supervision of research courses leading to the higher degrees. This work was organized at this University in 1893 with a view to enable properly equipped students to avail themselves of the advantages which Washington offers for original investigations. Announcements relative to the official matters of this Faculty are made by the Dean.

HIGHER DEGREES.

The higher degrees conferred in course by the University in this Division of the Department of Arts and Sciences are Master of Arts (A.M.), Master of Science (M.S.), Civil Engineer (C.E.), Electrical Engineer (E.E.), Mechanical Engineer (M.E.), Doctor of Jurisprudence (Jur.D.), and Doctor of Philosophy (Ph.D.).

ADMISSION.

Candidates for admission to courses for higher degrees must present the diplomas they hold, or certificates that they have received such diplomas, to the Secretary of the University, and obtain from him application blanks. When properly filed and signed, these applications are to be submitted to the Dean of the Faculty of Graduate Studies, together with catalogues of the institutions from which the candidates hold their degrees and certificates of their course of study at such institutions. All such applications should be accompanied by testimonials as to character and scholarship.

* Giving part time to teaching in the University.

† Absent on leave.

DEGREES OF MASTER OF ARTS AND MASTER OF SCIENCE.

To be admitted to candidacy for the Master's degree a student must have completed a liberal undergraduate course of study such as is required by colleges of good standing antecedent to the baccalaureate degree. The Faculty of Graduate Studies reserves the right to decide in all cases whether the antecedent training fulfills the requirements. Moreover, the courses of study pursued must have been such as to qualify the candidate for pursuing the subjects chosen for the Master's degree. In seeking admission the applicant must state whether he desires to obtain the Specialist degree or the Liberal Culture degree.

The Specialist degree is designed for students who propose to proceed toward the Doctor of Philosophy degree. Such candidates are required to complete one major and two minor subjects selected from properly correlated University subjects approved by the Faculty upon recommendation of the professors in charge and to present a satisfactory dissertation. Only one of the minor topics may be selected from the University subject which includes his major topic. Work for which this degree has been awarded may be credited as one year of work toward the Doctor of Philosophy degree, provided that it be in the same field of work.

The Liberal Culture degree is designed for students who do not intend to specialize in their work. Such candidates are required to complete three full courses of studies, of two or three hours each, distributed among three University subjects, not more than six hours of which shall be given to any one subject. These subjects must have the approval of the Faculty on the recommendation of the professors in charge. The candidate must also present a dissertation in the field to which his major subject belongs.

A candidate for a Master's degree must pass at least one full year in residence and study at this University, and no work done by him for the Bachelor's degree shall be counted again for a higher degree.

HIGHER DEGREES IN ENGINEERING.

To be admitted to candidacy for higher degrees in Engineering a student must have completed a liberal undergraduate course of study such as is required by colleges of good standing antecedent to the baccalaureate degree in Engineering, and of such a character as to fit him to pursue to advantage the study of advanced engineering topics. The Faculty of Graduate Studies reserves the right to decide in all cases whether the antecedent training fulfills the requirements. Moreover, the courses of study pursued for the Bachelor's degree must be approved

by the Faculty as qualifying the candidate for pursuing the chosen line of study for the degree sought.

A candidate for a degree in Engineering shall pass at least one full year of residence and study at this University, sustain satisfactory examinations on the studies pursued and present an acceptable thesis, together with a bibliography. Three full courses is the minimum required as constituting a full year's work. The courses chosen must be passed upon by the Faculty of Graduate Studies and have the approval of the professors under whom they are to be taken.

DOCTOR'S DEGREES.

The degree of Doctor of Jurisprudence or Doctor of Philosophy is conferred upon a student who has pursued specialized courses in University Subjects; engaged in original research in certain of the various departments of law, letters or science under university auspices, for a period of not less than three years; has submitted an acceptable thesis, and has met all the requirements prescribed. The degree is given for high attainments and proved ability to do research work in some special branch of knowledge, as determined by the various tests applied.

Before a student can be admitted to candidacy for the Doctor's degree he must give evidence that he has completed a liberal undergraduate course of academic study such as is required by colleges of good standing antecedent to the baccalaureate degree, and of such a character as to fit him to pursue to advantage researches in the field chosen for graduate work. The Faculty of Graduate Studies reserves the right to decide in all cases whether the antecedent training fulfills the requirements. The applicant may be credited with graduate work done at other universities, provided such work is shown to be of grade similar to that required here, but the last year must be spent in residence at this University and the other requirements of the degree as prescribed must be fulfilled.

The candidate for the Doctor's degree shall offer three topics from the University Subjects—one major and two collateral minor studies—the combination to be approved by the Faculty of Graduate Studies. These must be pursued under the guidance of a committee consisting of the professors in charge of the University Subjects in which the studies are pursued, with the professor in the major subject as chairman. This committee will determine his division of time, study, and research among the major and minor topics, but in general the major topic should be pursued during the whole time devoted to graduate work, and each minor topic during at least one year. The candidate shall pass satisfactory examinations upon the three subjects selected. He must satisfy the Faculty that he can read understandingly in the

original, French and German works pertaining to his special field. In order to graduate the candidate must possess a broad acquaintance with his major subject and he must present a dissertation upon some topic approved by the professor in charge of his major subject, which shall be a contribution to knowledge and which shall be accompanied by an adequate bibliography.

EXAMINATIONS.

Candidates must pass written examinations upon all their topics. The examinations upon the minor topics may be taken at the close of the respective years in which these topics are completed, or later, at the discretion of the examiner. The final written examination on the major topic shall cover the candidate's entire university work, and shall be given when the professor of that subject is satisfied that the student has taken sufficient work to warrant such an examination being taken.

Every candidate for a Doctor's degree must pass an oral examination in all these subjects, and must defend his dissertation in the presence of the Faculty of Graduate Studies, or of so many of its members as may desire or may be designated by the Faculty to attend, and such other specialists as it may invite. The oral examination will not be confined to the dissertation nor to courses of study pursued at this University, but the candidate is expected to show a satisfactory knowledge of his major subject as a whole, and a general acquaintance with the broader field of knowledge of which this subject forms a part. If a student has satisfactorily passed his final written examinations, he may be permitted to complete his dissertation away from the University and to postpone the taking of his oral examination until he has thus completed his dissertation.

The subjects from which the candidate's selection may be made, as the Faculty may determine in each case, are as follows:

Agriculture, Applied Mathematics, Architecture, Astronomy, Astrophysics, Bacteriology, Botany, Chemistry, Classical Archæology, Economics, Education, Civil Engineering, Electrical Engineering, Hydraulic Engineering, Mechanical Engineering, English, Ethics, Geology and Mineralogy, Germanic Languages and Literature, Greek Language and Literature, Histology and Embryology, History, International Law and Diplomacy, Latin Language and Literature, Law, Mathematics, Meteorology, Pathology, Philosophy, Physics, Physiology and Pharmacology, Political Sciences, Preventive Medicine, Psychology, Romance Language and Literature, Semitic Languages and Literature, Sociology, Zoology.

DEGREE OF DOCTOR OF JURISPRUDENCE.

Candidates for this degree must hold the degree of Bachelor of Law from this University or from some other institution requiring equivalent work as a prerequisite for this degree, in addition to satisfying the requirements for admission to candidacy for a Doctor's degree set forth above. He must possess a reading knowledge of Latin, French, and German. His major topic, and at least one of his minor topics, must be in subjects taught in the Department of Law and Jurisprudence, but the other minor may be chosen from any University Subject which is properly related to his major topic. The degree is given for high attainments and proved ability to do research work in some special branch of law, as determined by the various tests applied.

DEGREE OF DOCTOR OF PHILOSOPHY.

Candidates for this degree may, with the approval of the Faculty upon recommendation of the professors in charge, select their topics from properly correlated University Subjects, but only one of the minor topics may be in the subject which includes the major topic. He must by the tests applied prove his ability to do research work and his thorough acquaintance with the literature of the subject of which his dissertation treats.

REGULATIONS REGARDING DISSERTATIONS.

Dissertations must be presented to the Dean not later than May 1 for graduation in June, or January 3 for graduation at the Winter Convocation. They must be typewritten on official dissertation paper, which may be obtained from the Treasurer of the University. The dissertation will be presented by the Dean to the Faculty, and by it referred to a committee for examination as to its merit. After their acceptance, dissertations, with their accompanying drawings, are the property of the University, and must be deposited in the University archives, but the authors of them are permitted to make copies. The candidate shall arrange, to the satisfaction of the Faculty, to print his dissertation within one year after the degree is granted, under the supervision of the professor in charge of his major subject, and shall present one hundred copies to the University, to be distributed among institutions of learning.

DOCTORATE DISPUTATIONS.

A Doctorate Disputation was held publicly in University Hall, May 23, 1910. The theses that were successfully defended, the candidates, and the members of the boards of experts were as follows:

Thesis: The Relation of the Dutch Republic to the American Revolution. By AUGUST FREDERICK WILHELM EDLER, B.A., 1906; M.A., 1907; M.Dip., 1908, The George Washington University. Before J. FRANKLIN JAMESON, Ph.D., Director of Historical Research, Carnegie Institution of Washington; CHARLES H. MCCARTHY, Ph.D., Professor of Constitutional and Political History, The Catholic University of America; Rev. EDWARD I. DEVITT, S. J., Professor of History of Philosophy, Georgetown University. Assistant Professor WILLIAM RAY MANNING, Ph.D., presiding.

Thesis: The Naciminto and Torrejon Formations of the Puerco Group. By JAMES HENRY GARDNER, B.S., 1900; M.S., 1906, Kentucky State College. Before C. W. HAYES, Ph.D., Chief Geologist, U. S. Geological Survey; WHITMAN CROSS, Ph.D., Geologist, Geological Survey; F. H. KNOWLTON, Ph.D., Geologist, U. S. Geological Survey. Professor GEORGE P. MERRILL, Ph.D., presiding.

Thesis: Solar Radiation, Atmospheric Absorption and Sky Polarization. By HERBERT HARVEY KIMBALL, B.S., 1884, New Hampshire College of Agriculture and Mechanic Arts; M.S., 1900, Columbian University. Before P. G. NUTTING, Ph.D., Associate Physicist, U. S. Bureau of Standards; C. W. WADNER, Ph.D., Associate Physicist, U. S. Bureau of Standards; L. B. ALDRICH, B.A., M.A., Assistant Astrophysical Observatory, Smithsonian Institution. Professor FRANK H. BIGELOW, L.H.D., presiding.

Thesis: On Some Mental Processes of the Rhesus Monkey. By WILLIAM THOMAS SHEPARD, B.Sc., 1899, Gale College; M.A., 1905; M.S., 1906, Oklahoma State University. Before FRANK BAKER, M.D., Ph.D., Superintendent, National Zoölogical Park; HERBERT S. JENNINGS, Ph.D., Professor of Experimental Zoölogy, Johns Hopkins University; WILLARD S. SMALL, Ph.D., Principal, Eastern High School of Washington. Professor SHEPARD IVORY FRANZ, Ph.D., presiding.

TEACHING FELLOWSHIPS.

There have been established by the Board of Trustees five Fellowships in Graduate Studies. One of these Fellowships yields \$600; two, \$500, and two, \$400 per annum, but they do not exempt the holder from the charges for tuition. The holders of these Fellowships are expected to teach Undergraduate classes not less than two nor more than eight hours a week in the departments of instruction in which they are pursuing graduate work. These Fellowships are to be bestowed upon candidates who take regular Graduate courses with a view to the Doctor of Philosophy degree and expect to devote their lives to teaching or research in some branch of science, politics or letters. Copies of the regulations under which appointments are made may be obtained from the Secretary of the University.

THE FACULTY OF UNDERGRADUATE STUDIES.

- CHARLES H. STOCKTON, LL.D.... ACTING PRESIDENT OF THE UNIVERSITY
 HOWARD LINCOLN HODGKINS, Ph.D.... Professor of Mathematics, and
 Dean of the College of Engineering and Mechanic Arts
 HERMANN SCHOENFELD, Ph.D., LL.D..... Professor of German
 CHARLES EDWARD MUNROE, Ph.D., Professor of Chemistry, and Dean
 of the Faculty of Graduate Studies
 *GEORGE P. MERRILL, Ph.D..... Professor of Geology and Mineralogy
 WILLIAM ALLEN WILBUR, A.M.... Professor of English, and Dean of
 the College of Arts and Sciences
 CHARLES CLINTON SWISHER, Ph.D., LL.D..... Professor of History
 *PAUL BARTSCH, Ph.D..... Professor of Zoölogy
 GEORGE N. HENNING, A.M..... Professor of Romance Languages
 WILLISTON S. HOUGH, Ph.M..... Professor of Philosophy, and Dean
 of the Teachers College
 JAMES BROWN SCOTT, M.A., J.U.D.... Professor of International Law
 *ALBERT MANN, Ph.D..... Professor of Botany
 *HENRY PARKER WILLIS, Ph.D..... Professor of Finance, and Dean
 of the College of the Political Sciences
 CHARLES SIDNEY SMITH, Ph.D..... Professor of Greek and Latin
 *NEVIL MONROE HOPKINS, Ph.D..... Assistant Professor of Chemistry
 †PHILANDER BETTS, E.E.... Assistant Professor of Electrical Engineering
 *EDWIN A. HILL, Ph.D..... Assistant Professor of Chemistry
 *THOMAS MALCOLM PRICE, Ph.D..... Assistant Professor of Chemistry
 *RAY SMITH BASSLER, Ph.D..... Assistant Professor of Geology
 †DE WITT C. CROISSANT, A.B..... Assistant Professor of English
 ALFRED F. W. SCHMIDT, A.M..... Assistant Professor of German
 EDWIN V. DUNSTAN, C.E.... Assistant Professor of Civil Engineering
 OSCAR A. MECHLIN, C.E.... Assistant Professor of Civil Engineering
 WILLIAM CARL RUEDIGER, Ph.D.... Assistant Professor of Educational
 Psychology
 †JAMES FREDERICK PEAKE, A.M..... Assistant Professor of History
 OTIS D. SWETT, M.S., LL.M..... Assistant Professor of Chemistry
 F. CHARLES STARR, B.S..... Assistant Professor of Civil Engineering
 CHARLES W. MORTIMER, B.S., M.E.... Assistant Professor of Electrical
 Engineering
 BLAINE F. MOORE..... Assistant Professor of Political Science
 *GEORGE MORTON CHURCHILL, A.M..... Instructor in History
 ROBERT R. KERN, A.B..... Instructor in Economics
 H. F. A. SCHOENFELD, A.M..... Instructor in History

* Giving part time to teaching in the University.

† Absent on leave.

HAYNER H. GORDON, E.E. Instructor in Mechanical Engineering
 ROBERT W. MORSE, S.B. Instructor in Mechanical Engineering
 MARK R. WOODWARD, E.E. Instructor in Electrical Engineering
 LESLIE CLEVELAND McNEMAR, A.B. Instructor in Political Science
 and International Law

EXECUTIVE FACULTIES.

College of Arts and Sciences.

Dean WILBUR, Professors MUNROE, HENNING, SMITH, Assistant
 Professor PEAKE.

College of Engineering and Mechanic Arts.

Dean HODGKINS, Professors SCHOENFELD, MERRILL, Assistant Pro-
 fessors BETTS, DUNSTAN, MECHLIN, STARR.

College of the Political Sciences.

Dean WILLIS, Professors SWISHER, LORENZEN, and Assistant Professor
 MOORE.

Teachers College.

Dean HOUGH, Professors BARTSCH, FRANZ, Assistant Professors
 CROISSANT, SCHMIDT, RUEDIGER, and Dr. SMALL.

COLLEGE OF ARTS AND SCIENCES.

The session of 1910-11 begins Wednesday, September 28, 1910.
The College of Arts and Sciences is open to men and women.

ADMISSION.

Every applicant for admission is required to present a testimonial of good character, and also a certificate of standing and regular dismissal from the school or college which he has attended or from the tutor with whom he has studied.

Candidates for admission to the Freshman Class may present certificates of admission or take an examination in the required subjects. Certificates, in lieu of any or all examinations, will be accepted from schools whose work is attested by well-prepared students admitted to the University in previous years, and from schools that present evidence of affording adequate preparation in the required subjects. The Secretary of the University will, on application, furnish certificate blanks to the principals of such accredited schools.

The certificate of the College Entrance Examination Board will be accepted in so far as the subjects specified meet the requirements for admission.

The requirement for admission is a four-year high-school course, or its equivalent, amounting to fifteen "units."

A unit represents a year's study in any subject in a secondary school, constituting approximately a quarter of a full year's work.

These fifteen units must include English, 3 units; Mathematics, 2 units; and one of the following languages: Latin, 4 units; Greek, 3 units; French, 2 units; German, 2 units; or Spanish, 2 units. The remainder of the requirement is elective and may be satisfied in general by any accredited secondary school subject.

ENTRANCE EXAMINATIONS.

The regular examinations for admission are held in May.
The following is the schedule:

Tuesday, May 23, 1911.

Elementary Latin	9.00-11.00
Plane Geometry	11.00- 1.00
Physics	2.00- 4.00
Greek	2.00- 5.00

Wednesday, May 24.

Elementary Algebra	9.00-11.00
Elementary French	11.00- 1.00
Elementary German	2.00- 4.00
Ancient History.....	4.00- 6.00

Thursday, May 25.

Plane Trigonometry	9.00-11.00
Advanced French, Advanced German.....	11.00- 1.00
English	2.00- 5.00

Friday, May 26.

Advanced Algebra	9.00-11.00
Solid Geometry	11.00- 1.00
Chemistry; Advanced Latin.....	2.00- 4.00

Subjects offered for admission, but not named in the schedule of examinations, will be arranged for as occasion arises.

Unless admitted by certificate, every undergraduate candidate for a degree is required to pass an examination.

DEFINITION OF REQUIREMENTS.

ENGLISH.

(Three units.)

No candidate will be accepted in English whose work is notably defective in point of spelling, punctuation, idiom, or division into paragraphs.

a. READING AND PRACTICE—one and one-half units. The form of examination will usually be the writing of a paragraph or two on each of several topics to be chosen by the candidate from a considerable number—perhaps ten or fifteen—given in the examination paper. The treatment of these topics is designed to test the candidate's power of clear and accurate expression, and will call for only a general knowledge of the substance of the books. *In every case knowledge of the book will be regarded as less important than the ability to write good English.* In preparation for this part of the examination, it is important that the candidate shall have been instructed in the fundamental principles of rhetoric.

Candidates should read the books prescribed for the year in which they propose to present themselves for this part of the examination.

In 1911 the ten books for reading and practice selected from the list recommended by the Conference on Uniform Entrance Requirements in English are as follows:

Shakespeare's *As You Like It* and *Julius Cæsar*; *The Sir Roger de Coverley Papers* in the *Spectator*; Chaucer's *Prologue*; Thackeray's *Henry Esmond* and Dickens' *A Tale of Two Cities*; Lamb's *Essays of Elia* and Ruskin's *Sesame and Lilies*; Coleridge's *The Ancient Mariner* and Tennyson's *Gareth*; and *Lynette, Lancelot and Elaine*, and *The Passing of Arthur*.

A candidate may, by giving due notice, substitute any other list that conforms to the requirements recommended by the Conference on Uniform Entrance Requirements in English.

b. STUDY AND PRACTICE—one and one-half units. This part of the examination presupposes the thorough study of each of the works named below. The examination will be upon subject-matter, form, and structure. In addition, the candidate may be required to answer questions involving the essentials of English grammar, and questions on the leading facts in those periods of English literary history to which the prescribed works belong.

The books set for this part of the examination will be:

1911: Shakespeare's *Macbeth*; Milton's *Lycidas*, *Comus*, *L'Allegro*, and *Il Penseroso*; Burke's *Speech on Conciliation with America*, or Washington's *Farewell Address* and Webster's *First Bunker Hill Oration*; Macaulay's *Life of Johnson*, or Carlyle's *Essay on Burns*.

LATIN.

Elementary (Two units).

- a. i. Latin Grammar: The inflections; the simpler rules for composition and derivation of words; syntax of cases and the verbs; structure of sentences in general, with particular regard to relative and conditional sentences, indirect discourse, and the subjunctive.
- ii. Latin Prose Composition: Translation into Latin of detached sentences and easy continuous prose based upon Cæsar.
- b. Cæsar: Any four books of the Gallic War, preferably the first four.

Advanced (Two units).

- a. Cicero: Any six orations from the following list, but preferably the first six mentioned:
The four orations against Cataline, Archias, the Manilian Law, Marcellus, Roscius. Milo, Sestius, Ligarius, the Fourteenth Philippic.
- b. Vergil: The first six books of the *Æneid*.
- c. Advanced Prose Composition, consisting of continuous prose of moderate difficulty based on Cicero.
- d. Sight Translation, based on prose of no greater difficulty than the easier portions of Cicero's orations.

GREEK.

Elementary (Two units).

- a. i. Greek Grammar: The topics for the examination in Greek grammar are similar to those detailed under Latin grammar.
- ii. Greek Prose Composition, consisting principally of detached sentences to test the candidate's knowledge of grammatical constructions.

The examination in grammar and prose composition will be based on the first two books of Xenophon's *Anabasis*.

- b. Xenophon: The first four books of the *Anabasis*.

Advanced (One unit).

- a. *Homer*: The first three books of the *Iliad* (omitting II. 494, to end).
- b. Sight Translation, based on prose of no greater difficulty than Xenophon's *Anabasis*.

FRENCH.

Elementary (Two units). Candidates in Elementary French must have a good knowledge of the essential parts of grammar, with stress on pronouns and on regular verbs and the common irregular verbs. They must know the principles of pronunciation; must be able to translate simple English sentences or easy connected prose into French, and to translate accurately ordinary modern French prose. Candidates must have translated not less than 450 duodecimo pages by at least four different authors, of which amount at least one-third must be history. Candidates must have had a two-years' course of five periods per week.

Advanced (Two units). Candidates in Advanced French must have partly translated, partly read, in addition to the requirements for Elementary French, at least 1,000 pages of difficult French of several different authors, including history, fiction, drama, and poetry. Candidates must have had a four-years' course of five periods per week.

Fraser and Squair's French Grammar or Grandgent's *Essentials of French Grammar* is recommended.

SPANISH.

(Two units.)

Candidates in Spanish must have a good knowledge of grammar, including syntax, with stress on pronouns and verbs, regular and irregular. They must know the principles of pronunciation. They must be able to translate simple English sentences or easy connected prose into Spanish, and to translate accurately fairly difficult modern Spanish prose and verse. Candidates must have translated not less than 500

pages by at least four different authors, of which amount at least one-fourth must be history or drama. Candidates must have had a two-years' course of five periods per week.

GERMAN.

Elementary (Two units). Candidates in Elementary German must have had a two-years' course of five periods a week. They must be able to read fluently at sight and to translate easy narrative prose and poetry. An accurate knowledge of an elementary German grammar is requisite, to be tested by the translation into German of some fifteen sentences. About 300 pages of graduated narrative prose, one short play, and such poetry as is usually found in a First Reader will be considered an adequate preparation.

Advanced (Two units). Candidates in Advanced German must have had a four-years' course of five periods a week. They should be well trained in the syntactical laws of the language, have read about 800 pages of good literature in prose, preferably such prose works as are given in the Report of the Committee of Twelve of the Modern Language Association, and poetry, especially dramas by Lessing, Schiller, and Goethe, and studied an elementary history of German literature. German composition should comprise a number of short themes upon assigned historical or literary topics, lives of the authors read, etc.

HISTORY.

In this subject special importance is attached to preparation in geography.

Ancient (One unit).

- a. Greek History, through the Roman Conquest; as much as is contained in Myer's, Bottsford's, or West's History of Greece.
- b. Roman History; as much as is contained in Allen's, Bottsford's, or West's History of the Roman People.

Mediæval and Modern European History (One unit). As much as is contained in Myer's History of Mediæval and Modern Europe.

English History (One unit). As much as is contained in Larned's or Cheyney's History of England.

American History with the Elements of Civil Government (One unit). As much as is contained in Fiske's History of the United States, and Fiske's Civil Government.

MATHEMATICS.

Elementary Algebra (One unit).

i. Algebra to Quadratics:

The four fundamental operations for rational algebraic expressions, factoring, highest common factor, lowest common multiple, complex fractions, the solution of equations of the first degree containing one or more unknown quantities, radicals, including the extraction of the square root of polynomials and numbers, and fractional and negative exponents.

ii. Quadratics, etc.:

Quadratic equations and equations containing one or more unknown quantities that can be solved by the methods of quadratic equations, problems depending upon such equations, ratio and proportion, and the binominal theorem for positive integral exponents.

Advanced Algebra (One-half unit).

i. Progressions, etc.:

The progressions, the elementary treatment of permutations and combinations, and the use of four and five place tables and logarithms.

ii. Series, etc.:

Undetermined coefficients, the elementary treatment of infinite series, the binominal theorem for fractional and negative exponents, and the theory of logarithms.

iii. Theory of equations:

Determinants and the elements of the theory of equations, including Horner's method for solving numerical equations.

Plane Geometry (One unit).

General text propositions, including the solution of simple original exercises and numerical problems.

Solid Geometry (One-half unit).

Properties of straight lines and planes, of dihedral and polyhedral angles, of projections, of polyhedrons, including prisms, pyramids, and the regular solids; of cylinders, cones, and spheres, of spherical triangles and the measurement of surfaces and solids.

Plane Trigonometry (One-half unit).

The definitions and relations of the six trigonometrical functions as ratios, proof of important formulas, theory of logarithms and use of tables, solution of right and oblique plane triangles.

PHYSICS.

(One unit.)

It is recommended that the candidate's preparation should include:

- a. Individual laboratory work, comprising at least thirty-five exercises well distributed over the subjects of physics.
- b. Instruction by lecture-table demonstrations.
- c. The study of at least one standard text-book, supplemented by the use of many and varied numerical problems. The metric system should be familiar to the student.

The laboratory note-book must be submitted for inspection, whether the candidate is admitted on certificate or by examination.

CHEMISTRY.

(One unit.)

The candidate's preparation in chemistry should include:

- a. Individual laboratory work, comprising at least forty experiments of a character analogous to those set forth by the College Entrance Examination Board. The laboratory note-book must be submitted for inspection.
- b. Instruction by lecture-table demonstrations.
- c. The study of at least one modern text-book.

Requirements.—The ground to be covered should include the following: The chief physical and chemical characteristics, the isolation and the recognition of the following elements and the preparation and study of their principal compounds: *Oxygen, hydrogen, carbon, nitrogen, chlorine, bromine, iodine, fluorine, sulphur*, phosphorus, silicon, potassium, *sodium*, calcium, magnesium, *zinc*, copper, mercury, silver, aluminium, *lead*, tin, *iron*, manganese, chromium.

The more detailed study should be confined to the italicized *elements* (as such) and to a restricted list of compounds, such as water, hydrochloric acid, carbon monoxide, carbon dioxide, oxides of nitrogen, nitric acid, ammonia, sulphur dioxide, sulphuric acid, hydrogen sulphide, sodium hydroxide, ammonium hydroxide.

Attention should be given to the atmosphere (constitution and relation to animal and vegetable life), flame, acids, bases, salts, oxidation and reduction, crystallization, combining proportions by weight and volume, calculations founded on these and on Boyle's and Charles' laws, symbols, formulas, equations and nomenclature, atomic theory, atomic weights, nascent state, natural groupings of the elements, solution (solvents and solubility of gases, liquids, and solids), strength of acids and bases, conservation and dissipation of energy, chemical energy and electrolysis, and of valence, electrolytic dissociation, osmosis, mass ac-

tion in a very elementary way. Chemical terms should be clearly understood, and the student should be able to illustrate and apply the ideas that they embody. The theoretical topics are not intended to form separate subjects of study, but to be taught only so far as is necessary for the correlation and explanation of the experimental facts. The facts should be given as examples from various classes and not as isolated things.

ADDITIONAL SUBJECTS.

Certificates will be accepted in botany, zoölogy, physiology, physiography, political economy, drawing, music, and other accredited subjects in secondary schools.

Manual-training High School Subjects.

Technical subjects in manual-training high schools, or schools of similar grade, when duly certified, may be credited as follows:

Shopwork (not exceeding two units), domestic science and domestic art (not exceeding two units).

Business High School Subjects.

Commercial subjects in business high schools or schools of similar grade, when duly certified, may be credited as follows:

Accounting and Finance. (One unit.)

Bookkeeping. (Two units.)

Business Organization. (One unit.)

Commercial Law. (One unit.)

Government and Industrial Problems. (One-half unit.)

Commercial History. (One-half unit.)

Commercial and Physical Geography. (One-half unit.)

ADMISSION TO ADVANCED STANDING.

Candidates for admission to advanced classes in any department are examined in all indispensable preliminary studies.

Due credit is given for properly certified courses of study pursued in other colleges and universities.

ADMISSION TO SPECIAL COURSES.

All the courses of instruction are open to students of suitable age and attainments who wish, without reference to any degree, to pursue special studies. Candidates must show that they are familiar with the subjects preliminary to the studies which they wish to pursue.

REQUIREMENTS FOR DEGREES.

The undergraduate degrees offered by the College of Arts and Sciences are Bachelor of Arts and Bachelor of Science in Chemistry. To be recommended for either of these degrees, the student must be registered for at least one academic year, must satisfy the admission requirements, and must complete at least sixty "hours" of undergraduate courses.

An "hour" of credit is one hour of recitation or lecture work a week or one laboratory period a week for one academic year. Except in the last year of the course no student taking less than six hours of work will be registered as a regular student. But no time limit for the course is prescribed and the degree is given when the total of prescribed and elective courses is completed.

One grade of special distinction is recognized in awarding the bachelor's degree. It is shown by inserting the words "With Distinction" on the diploma after the name of the degree. It is awarded under the following conditions:

"That the names of all students who have received a mark of at least B (90 per cent) on courses representing at least sixty (60) per cent of all hours taken by them be submitted by the Dean to the Faculty of the Department in which the students shall be studying for a degree, after the completion of all final examinations in such students' final year of study for their degree;

"That the faculty, after separate consideration of each individual case, shall, if it see fit, recommend the awarding of the degree 'With Distinction' to students who shall have fulfilled the conditions above specified."

REQUIREMENTS FOR THE DEGREE OF BACHELOR OF ARTS.

To be recommended for the degree of Bachelor of Ar., the student must complete courses of study including a group of prescribed subjects, and aggregating at least sixty "hours."

There are six groups of prescribed subjects for the first two years of the college course. Every candidate for the degree of Bachelor of Arts elects one of these groups of prescribed subjects, and thereafter he is not permitted to change to another group except on condition that he fulfill the requirements of the group to which he changes.

The studies of the last two years of the course in the College of Arts and Sciences are elective, subject only to such administrative supervision as will insure the general consistency and the liberal character of the courses selected.

The scope of the six groups of prescribed subjects is a provision alike for the diversity in the subjects of the secondary school curriculum leading to a college course, and the needs of the various graduate and professional courses of study in the University for which the college course is a preparation.

Group I emphasizes Latin and Greek studies, and it would naturally be taken by students whose preparatory work has included four years of Latin. Group II emphasizes the Modern Languages, affording to students whose preparation has not included Latin the humanistic influences of the literatures of the Modern Languages. Group III emphasizes Mathematics and the Natural Sciences, and would naturally be selected by the student whose college preparation has been scientific rather than literary. Group IV consists of such studies as would lead to the Teachers College, including important general culture courses and a considerable number of electives to be chosen from the subjects that the student expects to teach. Group V consists of such studies as would constitute needed preparation for the Department of Law or for the College of the Political Sciences. Group VI consists of the subjects that should be taken by those intending to enter the Department of Medicine. The six groups are as follows:

(NOTE.—Whenever in the following groups French or German is taken, if it is elementary, the same language shall be continued the succeeding year.)

GROUP I.

	Hours.
English	6
History	3
Languages '	9
Latin	6
Mathematics	3
Psychology and Logic.....	3
	—
	30

To be elected from Greek, French, German.

GROUP II.

	Hours.
English	6
French	3
German	6
History	6
Mathematics or Science.....	3
Psychology and Logic.....	3
Romance Language	3
	—
	30

GROUP III.

	Hours.
English	3
History	3
Mathematics	6
Modern Languages	6
Psychology and Logic	3
Science	5
Electives	4
	—
	30

GROUP IV.

	Hours.
English	3
French, German, Latin or Greek	3
History	3
Mathematics or Science	3
Psychology and Logic	3
Philosophy, Economics or History	2 or 3
Science or Languages	5 or 6
Electives*	8 or 6
	—
	30

GROUP V.

	Hours.
Economics	3
English	6
History	7
Mathematics	3
Modern Languages or Latin	6
Science	3
Electives	3
	—
	31

GROUP VI.

	Hours.
English	3
German	3
History	3
Mathematics	3
Psychology and Logic	3

* Electives from the subjects named with a maximum limitation of 10 hours in any one subject.

	Hours.
Sciences:	
Chemistry, 1, 3, 23.....	7
Physics, 1, 2, or 2, 3.....	5
Biology	5
	—
	32

REQUIREMENTS FOR THE DEGREE OF BACHELOR OF SCIENCE IN CHEMISTRY.

Freshman Year.

	Hours.		Hours.
Chemistry, 1, 2.....	5	French or German.....	3
English, 1 or 2.....	3	Graphics, 1.....	2
Mathematics, 3 or 6.....	3		

Sophomore Year.

Chemistry, 3, 20.....	5	Mathematics, 9 or 12.....	3
French or German.....	3	Physics, 1, 2.....	5

Junior Year.

Chemistry, 4, 21, 23.....	6	Electrical Engineering, 7.....	3
French or German.....	3	Geology 1	2

Senior Year.

Chemistry, 6, 24, 25, 27.....	9	Geology, 2.....	2
Economics or History.....	3	Electives	2

COMBINED COURSES.

The regular courses in the College of Arts and Sciences are so correlated with courses in the professional departments that the degree of Bachelor of Arts and the professional degree in Law may be obtained in six years, and in Medicine in seven years.

SCHEDULE OF COURSES IN THE REQUIRED SUBJECTS FOR THE FIRST TWO YEARS.

	MON.	TUES.	WED.	THURS.	FRI.	SAT.
9:00	Math. 3	Eng. 21	Math. 3	Eng. 21	Math. 3	Eng. 21
10:00	Math. 9 Psychol. 1	Eng. 1 Physics 2 Span. 1	Math. 9 Psychol. 1	Eng. 1 Physics 2 Span. 1	Math. 9 Psychol. 1	Eng. 1 Span. 1
11:00	Econ. 20 French 1 German 3	German 1 Physics 2	Econ. 20 French 1 German 3	German 1 Physics 2	Econ. 20 French 1 German 3	German 1
11:30	Graphics 1 Latin 2 Physics 3	Chem. 2	Graphics 1 Latin 2 Physics 3	Chem. 2	Latin 2 Physics 3	
2:30	Graphics 1 Greek 1	Chem. 2 Hist. 26	Graphics 1 Greek 1	Chem. 2 Hist. 26	Greek 1	
3:30	Graphics 1 Hist. 2 Latin 1	Chem. 2	Graphics 1 Hist. 2 Latin 1	Chem. 2	Hist. 2 Latin 1	
4:50	Eng. 2 Math. 4 Physics 1 Hist. 1	Chem. 1 French 2 German 2	Eng. 2 Math. 4 Physics 1 Hist. 1	Chem. 1 French 4 German 2	Eng. 2 Physics 1 Math. 4 Hist. 1	Chem. 1 French 4 German 2
5:40	Econ. 20 Hist. 6 Eng. 20 Geology 2 Math. 12	French 2 Geology 1 German 4 Hist. 4 Math. 6	Econ. 20 Hist. 6 Eng. 20 Math. 12	French 2 Geology 1 German 4 Hist. 4 Math. 6	Econ. 20 Hist. 6 Eng. 20 Geology 2 Math. 12	French 2 German 4 Math. 6

PRIZES.

Only candidates for degrees may compete for these prizes.

STAUGHTON AND ELTON PRIZES.—The Staughton Prize, for excellence in the Latin Language and Literature, and the Elton Prize, for excellence in the Greek Language and Literature, founded by the Rev. Romeo Elton, D.D., of Exeter, England, consist of two gold medals, annually awarded to the best scholar in each of these languages.

RUGGLES PRIZES.—The Ruggles Prizes, for excellence in Mathematics, founded by Professor William Ruggles, LL.D., consist of two gold medals, annually awarded upon examination to the best two scholars in Mathematics.

DAVIS PRIZES.—The Davis Prizes, for excellence in Elocution, founded by the Hon. Isaac Davis, LL.D., of Massachusetts, consist of three gold medals, annually awarded to the successful competitors in a public contest. Only members of the Senior Class are eligible to compete for these prizes.

DAUGHTERS OF THE AMERICAN REVOLUTION PRIZES.—These prizes, founded by the Daughters of the American Revolution of the District of Columbia, consist of two gold medals, awarded annually to the two students in the graduating class who, having maintained a high standing in the regular courses in Mediæval, Modern European, English, and American History during three years, shall produce the best essays upon an assigned topic of American history.

THE THOMAS F. WALSH PRIZE.—This prize, established by Thomas F. Walsh, Esq., of Colorado, and based upon the income of one thousand dollars, consists of a gold medal awarded annually to that student of the graduating class who, having maintained a high standard in the regular classes of Mediæval, Modern European, English, and American History, shall produce the best essay upon a designated period of the History of Ireland.

E. K. CUTTER PRIZE.—The E. K. Cutter Prize in English was founded by the late Marion Kendall Cutter. The endowment is a fund of one thousand dollars, the income of which is given annually as a prize "for excellence in the study of English." The prize will be awarded to that member of the graduating class whose record in English, combined with general excellence, shows most marked aptitude and attainment in English studies.

WILLIE E. FITCH PRIZE.—The Willie E. Fitch Prize, for highest excellence in all branches of Chemistry, founded by James E. Fitch, Esq., in memory of his son, consists of fifty dollars, which is awarded annually for the best examinations in Chemistry.

THE GARDINER G. HUBBARD MEMORIAL PRIZE.—This is a prize in American History established by Mrs. Gertrude M. Hubbard in memory of her husband, the late Gardiner G. Hubbard. The endowment is a fund of one thousand dollars, the income from which is to be given annually to that student of the graduating class who has during four years maintained a high standing in the classes of American History, and who has produced the best essays upon subjects based upon a study of some assigned period of American history.

COLONIAL HISTORY PRIZE.—The Society of the Colonial Dames of America, Chapter III, offers annually a gold medal for excellence in American Colonial History. This prize will be awarded by the Professor of History for general excellence in this subject as shown by class standing, by special essays, and by such other tests as shall be prescribed.

PRIZE AWARDS 1909-10.

STAUGHTON PRIZE.....	Esther Foster
ELTON PRIZE.....	David Ransom Covell
RUGGLES PRIZE.....	Rena Preston Davis
MUNROE PRIZE.....	Omar Bailey Buchanan
DAVIS PRIZES:	
First Prize.....	Ernst Otto Schreiber, Jr.
Second Prize.....	David Alphonse Baer
DAUGHTERS OF THE AMERICAN REVOLUTION PRIZES:	
	Corinne Elizabeth Brackett
	Linda Lee Clift
THOMAS F. WALSH PRIZE.....	Linda Lee Clift
E. K. CUTTER PRIZE.....	Ernst Otto Schreiber, Jr.
OLD AND MIDDLE ENGLISH PRIZE.....	Rena Preston Davis
GARDINER G. HUBBARD MEMORIAL PRIZE.....	Ernst Otto Schreiber, Jr.
COLONIAL HISTORY PRIZE OF THE SOCIETY OF THE COLONIAL LADIES	
OF AMERICA.....	Corinne Elizabeth Brackett

SCHOLARSHIPS.

Applications for scholarships should be filed with the Dean not later than September fifteenth. All scholarships except the Kendall Scholarship and the University Scholarships are awarded for one year only, but they may be renewed. Any student holding a scholarship who fails to obtain a general average of 85 per cent on the work of any term or whose deportment is unsatisfactory will be reported to the President's Council, and in the absence of extenuating circumstances the scholarship will be revoked.

Scholarships for Competition.

The University offers the following scholarships to be awarded on competitive examination. Candidates for these scholarships take the May entrance examinations for the undergraduate course leading to the degree of Bachelor of Arts or the degree of Bachelor of Science, as they shall elect, and on the results of these examinations the scholarships are assigned. Holders of these scholarships are expected to pursue a regular course in the Department of Arts and Sciences leading to a degree. No scholarship is awarded to a candidate whose examination average is below 80 per cent.

KENDALL SCHOLARSHIP.—The Kendall Scholarship, founded by the late Hon. Amos Kendall, is annually conferred on that member of the graduating class of any of the Washington High Schools who attains the highest average in the entrance examinations. This scholarship continues throughout the undergraduate course, and the student holding it pays only the matriculation, library, laboratory, and graduation fees.

UNIVERSITY SCHOLARSHIPS.—The University offers also six scholarships, each continuing throughout the undergraduate course, to be awarded annually to members of the graduating classes of any of the Washington High Schools. The scholarships are divided, so far as the general averages will permit, among the several schools in proportion to the number of students in attendance upon each. Three scholarships are offered to young men and three to young women. These scholarships continue throughout the undergraduate course, and students holding them pay only the matriculation, library, laboratory, and graduation fees.

Scholarships for Assignment.

DAVIS SCHOLARSHIP.—This is the income of a fund of one thousand dollars given to the University in October, 1869, by Hon. Isaac Davis, of Massachusetts.

MARY LOWELL STONE SCHOLARSHIP.—This scholarship was founded by a woman in memory of a woman student of science. It consists of a fund of two thousand dollars, the income from which is to be paid to needy women students of science in the University.

MARIA M. CARTER SCHOLARSHIP.—This is the income of a fund of one thousand dollars given to the University in 1871 by Mrs. Maria M. Carter.

FARNHAM SCHOLARSHIP.—This is the income of a fund of one thousand dollars given to the University in 1871 by Mrs. Robert Farnham.

Ministerial Scholarships.

Students in regular courses preparing for the Christian Ministry, and not yet ordained, are exempt from tuition charges. Such students pay the matriculation, library, laboratory, and graduation fees.

Students in regular courses who are children of clergymen financially dependent wholly or in part upon their parents are exempt from one-half of all tuition charges. Such students pay the matriculation, library, laboratory, and graduation fees.

DAVIS PRIZE SPEAKING.

The Davis Prize Speaking is held in University Hall on the Tuesday after the Easter holidays. The Davis Prizes were founded by Hon. Isaac Davis, of Massachusetts, in 1847. The original endowment was five hundred dollars, "proceeds of which will afford three premiums, in cash or gold medals, of the value of \$5, of \$10, and of \$15 annually—these premiums or prizes to be distributed annually to such members of the Senior Class as shall have made the greatest progress in elocution since their connection with the College."

The award of these three prizes is determined by a public speaking contest, in which the participants deliver original orations. Senior students wishing to enter the competition should report to the Dean of the College not later than five weeks before the contest, and submit their orations not later than three weeks before the contest. The prizes are awarded by a committee consisting of three members, selected by the Executive Faculty of the College.

ENOSINIAN SOCIETY.

The Enosinian Society, a literary association, to which any University student is eligible, meets regularly for the purpose of improvement in debate and composition.

This society had its beginning March 6, 1822, during the first session of Columbian College, when a number of students held a meeting "for the purpose of establishing a debating society."

RELIGIOUS WORK.

The student movement in Association work is represented by the Young Men's Christian Association of the University, which was organized in the fall of 1905. The Association plans and conducts religious work among the men of the University. The Association calendar includes Bible study clubs, a weekly chapel service, and occasional men's meetings.

Similar lines of religious work are conducted among the women students by the Young Women's Christian Association of the College.

A chapter of the Brotherhood of St. Andrew was organized March 10, 1910, and a charter has since been granted.

Lectures and discussions on the subject of Christian missions are conducted by members of the College Faculty.

THE COLLEGE CHAPEL.

The College Chapel is held on Monday, Tuesday, Wednesday, and Thursday, at 12 o'clock, throughout the academic year. These chapel services are conducted by the Faculty. On Friday at 12 o'clock there are two services, conducted respectively by the Young Men's Christian Association and the Young Women's Christian Association.

The Dean of the College will confer with students as they may desire on questions concerning their welfare and will coöperate with them in all ways to make the college life one of personal helpfulness.

COLLEGE OF ENGINEERING AND MECHANIC ARTS.

The session of 1910-1911 begins Wednesday, September 28, 1910.

ADMISSION.

Every applicant for admission is required to present a testimonial of good character, and also a certificate of standing and regular dismissal from the school or college which he has attended or from the tutor with whom he has studied.

Candidates for admission to the Freshman Class may present certificates of admission or take an examination in the required subjects. Certificates, in lieu of any or all examinations, will be accepted from schools whose work is attested by well-prepared students admitted to the University in previous years, and from schools desiring coöperation with the University, that present evidence of affording adequate preparation in the required subjects. The Secretary of the University will, on application, furnish certificate blanks to the principals of such accredited schools.

The certificate of the College Entrance Examination Board will be accepted in so far as the subjects specified meet the requirements for admission.

The certificate of the Washington high schools covering all the requirements for admission admits students without examination to the courses of the Freshman year.

The certificates of all schools accredited to the University will be accepted in so far as they meet the requirements for admission.

The general requirement for admission is a four-year high school course, or its equivalent, consisting of five recitations per week in four or more topics. The high school studies which may be presented in satisfaction of the requirements of admission are given on pages 47-53 of this catalogue.

Candidates for admission to the Freshman Class in the College of Engineering are required to present fifteen units for admission, distributed as follows:

	Units.
English	3
French or German.....	4
Plane and Solid Geometry.....	1½
Elementary and Advanced Algebra.....	1½
Plane Trigonometry	½
Chemistry	1
Physics	1
Electives	2½

NOTE.—The modern language requirement may be satisfied by presenting four units in one language, or two units in French and two units in German. Students who present four units in one language will study the other language two years in College. Students who present two units in French and two units in German will study each language one year in College.

ADMISSION TO ADVANCED STANDING.

Candidates for admission to advanced classes in any department are examined in all indispensable preliminary studies.

Due credit is given for properly certified courses of study pursued in other colleges and universities.

ADMISSION TO SPECIAL COURSES.

All the courses of instruction are open to students of suitable age and attainments who wish, without reference to any degree, to pursue special studies. Candidates must show that they are familiar with the subjects preliminary to the studies which they wish to pursue.

COURSES FOR A DEGREE.

Three courses of study are offered:

- I. CIVIL ENGINEERING.
- II. ELECTRICAL ENGINEERING.
- III. MECHANICAL ENGINEERING.

These courses occupy four years each, and lead to the degree of Bachelor of Science in Civil Engineering, in Electrical Engineering, and in Mechanical Engineering, respectively. Graduate courses of one year under the Faculty of Graduate Studies of the George Washington University are open to those who receive the above degrees, and lead, respectively, to the degrees of Civil Engineer, Electrical Engineer, and Mechanical Engineer.

The courses in engineering are planned to give the student a thorough understanding of the theory underlying engineering practice, and such a practical knowledge of the instruments and methods of his particular profession as will enable him to apply the theory properly. In all the courses a thorough training in mathematics, pure and applied, and in drawing and descriptive geometry is required as the basis of the analytical and graphical study of engineering topics. Much stress is laid on the work in the drawing-room and laboratory. The work is planned to give him a thorough knowledge of principles upon which he may build, and by which he may be able to solve the new problems he meets in practice.

The work of the first year is the same for all students. It is taken up partly with general studies which have both an educational and a cultural value, and partly with work in mathematics and drawing which lays the foundations for the subsequent courses. In each of the other years there are studies taken in common by all engineering students; these studies including courses in English, in French and German, in pure and applied mathematics, in drawing and descriptive geometry, in chemistry and in physics. The requirement in French and German is intended to give the student an accurate reading knowledge of these languages, with particular reference to scientific literature.

Beginning with the Sophomore year, the Civil Engineering student enters upon his technical studies, continuing at the same time a number of topics of a more general character, and in the Junior and Senior years the work becomes yet more specialized. He begins with a general course in surveying and follows this with courses in railroad and highway location and construction. Theoretical hydraulics and hydraulic engineering receive careful and detailed treatment and much stress is laid on sanitary work, both in its theory and applications. A preliminary course in engineering materials and simple constructions in the Sophomore year is followed in later years by extended courses in mechanics of materials, and in the theory and design of structures in wood, steel, and masonry, in which are applied the knowledge gained in the courses in mechanics and graphic statics.

The courses for Electrical and Mechanical Engineering students are the same during the Sophomore year, and beside the general studies required of all engineering students include courses in advanced drawing and design and in kinematics of machinery. Shopwork begins in this year and continues until the end of the course for both classes of students, although the Electrical students give less time to it than do the Mechanical students. The purpose of the work is not primarily to give manual skill, but to give such an understanding of tools and processes as will be of assistance in designing and in superintending. In the Junior year Electrical and Mechanical students take in common courses in steam engineering and on boilers and power plants.

The Electrical students begin their special work in electricity in the Junior year. Theoretical electricity is first studied, and is followed by engineering electricity, and by courses on direct current machinery. In the laboratory, experimental work in exact measurements is followed by the study of the dynamo. In the Senior year alternating current machinery is studied, both theoretically and practically; and courses on the applications of electricity and on light and power distribution are taken. In the drawing-room are studied related problems in design. Many hours are given to work in the electrical and general engineering laboratories.

The Mechanical Engineering students, in addition to the courses which they take in common with the electrical students, have courses in engine design, including steam and gas engines; in hydraulics and hydraulic machinery; and a course in electrical engineering, considering electrical machinery from the standpoint of one who is to use it rather than to design it.

The engineering courses are partly lecture and partly laboratory and drawing-room courses, the plan being to give the theory in the class-room, to illustrate the theory in the laboratory, and to have the student apply the theory, from given data, in the drawing-room.

REQUIREMENTS FOR A DEGREE.

The arrangement of the topics in each of the regular courses for a degree is shown below. The numbers following the names of subjects refer to the courses as given in the list of University Subjects on pages 80-112, to which reference should be made for more complete description.

COMMON TO ALL COURSES.

Freshman Year.

Chemistry, 1, 7.
General Chemistry and Qualitative Analysis.
English, 1 or 2.
Rhetoric.
French or German.
Graphics, 1.
Mechanical and Freehand Drawing.
Mathematics, 9 or 12.
Trigonometry; Analytic Geometry.

CIVIL ENGINEERING COURSE.

Sophomore Year.

Civil Engineering, 1, 4.
Surveying; Materials of Construction.
French or German.
Graphics, 8, 10.
Descriptive Geometry; Topographic Drawing.
Mathematics, 20 or 21.
Calculus.
Physics, 1, 2.
General Physics; Laboratory Physics.

Junior Year.

- Applied Mathematics, 20, 22.
 Mechanics; Mechanics of Materials.
Chemistry, 6.
 Metallurgy.
Civil Engineering, 2, 3, 8, 22.
 Railroad Engineering; Highway Engineering; Practical Astronomy; Theory of Structures.
Electrical Engineering, 6.
 Industrial Engineering.
Geology, 2.

Senior Year.

- Applied Mathematics, 21.
 Hydraulics.
Civil Engineering, 20, 21, 23, 24.
 Masonry; Hydraulic Engineering; Theory of Structures; Sanitary Engineering.
Contracts and Business Law.
Mechanical Engineering, 12.
 Steam Engineering.

ELECTRICAL ENGINEERING COURSE.

Sophomore Year.

- French or German.
Graphics, 2, 8.
 Advanced Mechanical Drawing; Descriptive Geometry.
Mathematics, 20 or 21.
 Calculus.
Mechanical Engineering, 1, 4.
 Mechanism; Shopwork.
Physics, 1, 2.
 General Physics; Laboratory Physics.

Junior Year.

- Applied Mathematics, 20, 22.
 Mechanics; Mechanics of Materials.
Chemistry, 6.
 Metallurgy.
Electrical Engineering, 1, 2, 3, 4, 5.
 Elementary Electricity; Direct Current Machinery; Electrical Engineering; Electrical Measurements; Electrical Engineering Laboratory.
Mechanical Engineering, 5, 20.
 Metal-work; Steam Engineering.

Senior Year.

Applied Mathematics, 21.

Hydraulics.

Civil Engineering, 5, 6.

Surveying Instruments; Foundations.

Contracts and Business Law.

Electrical Engineering, 8, 21, 22, 23, 24, 26, 27.

Electrical Designs; Alternating Currents; Electrical Distribution; Electrical Applications; Electrical Engineering Laboratory; Electric Lighting; Electric Railways.

Mechanical Engineering, 10, 23.

Engineering Laboratory; Hydraulic Machinery.

MECHANICAL ENGINEERING COURSE.

Sophomore Year.

French or German.

Graphics, 2, 8.

Advanced Mechanical Drawing; Descriptive Geometry.

Mathematics, 20 or 21.

Calculus.

Mechanical Engineering, 1, 4.

Mechanism; Shopwork.

Physics, 1, 2.

General Physics; Laboratory Physics.

Junior Year.

Applied Mathematics, 20, 22.

Mechanics; Mechanics of Materials.

Civil Engineering, 22.

Theory of Structures.

Mechanical Engineering, 5, 6, 9, 20.

Metal-work; Engineering Drawing; Engineering Laboratory; Steam Engineering.

Senior Year.

Applied Mathematics, 21.

Hydraulics.

Chemistry, 6.

Metallurgy.

Civil Engineering, 5, 6.

Surveying Instruments; Foundations.

Contracts and Business Law.

Electrical Engineering, 7.

Dynamos and Motors.

Mechanical Engineering, 7, 10, 22, 23, 25, 28.

Machine Design; Engineering Laboratory; Internal Combustion Motors; Hydraulic Machinery; Compression and Refrigeration Machinery; Industrial Management.

PRIZES.

Only candidates for degrees may compete for these prizes.

RUGGLES PRIZES.—The Ruggles Prizes, for excellence in Mathematics, founded by Professor William Ruggles, LL.D., consist of two gold medals, annually awarded upon examination to the best scholars in Mathematics.

DAVIS PRIZES.—The Davis Prizes, for excellence in Elocution, founded by the Hon. Isaac Davis, LL.D., of Massachusetts, consist of three gold medals, annually awarded to the successful competitors in a public contest. Members of the Senior Class are eligible to compete for these prizes.

MUTH PRIZE.—Geo. F. Muth & Co. offer a set of drawing instruments to the student taking Advanced Mechanical Drawing who makes the highest average record in that subject and in the previous year's Mechanical Drawing.

PRIZE AWARDS, 1909-10.

CLASS OF '96 JAMES MACBRIDE STERRETT, JR., MEMORIAL PRIZE:

Augustin M. Prentiss

THE FRED A. SCHMIDT PRIZE.....Howard Palmer Safford

THE MUTH PRIZE.....Paul Raymond Boesch

SCHOLARSHIPS.

Applications for scholarships should be filed with the Dean not later than September fifteenth. All scholarships except the Kendall Scholarship and the University Scholarship are awarded for one year only, but they may be renewed. Any student holding a scholarship who fails to obtain a general average of 85 per cent on the work of any term or whose deportment is unsatisfactory will be reported to the President's Council, and in the absence of extenuating circumstances the scholarships will be revoked.

The Kendall Scholarship and the University Scholarships are open to students in the College of Engineering. Detailed statements in regard to these scholarships are given on pages 60-61.

HENRY HARDING CARTER SCHOLARSHIPS.—These scholarships, founded by Mrs. Maria M. Carter in memory of her husband, Henry Harding Carter, consist of four scholarships of the annual value of fifty dollars each, and may be awarded to deserving students who are preparing for the civil engineering profession.

ADMIRAL POWELL SCHOLARSHIPS.—The Admiral Powell Scholarships were founded by the late Admiral Powell, U. S. Navy. The income from this endowment is for the "free education of such young men as may desire to take advantage of the said endowment by way of their preparation for entrance into the Naval Academy at Annapolis, Maryland, or such as may fit them to become mates or masters in the Merchant Marine Service of the United States," and of "such apprentices as, having filled their time in the great steam manufactory establishments of the country, may apply for appointment from civil life in the Steam Engineer Department of the United States Navy." The number of scholarships awarded each year will be determined by the income from the endowment. Each scholarship will entitle the beneficiary to free tuition for one year. Such special courses of study are offered to each student as will give him the instruction needed to accomplish the purpose for which he is awarded the scholarship.

These scholarships are especially applicable to those who intend to come up for examination as warrant officers in the Engineer Department of the Navy, or to those who desire to fit themselves for responsible positions in the mercantile marine.

The subjects to be taken by a student will vary according to his preparation and according to the purpose for which he has been awarded the scholarship, but a year's work can be selected from the following topics:

	Hours.
Navigation and Nautical Astronomy.....	6
Algebra and Geometry.....	3
Trigonometry	1½
Mechanical and Machine Drawing.....	4
English	3
French	3
German	3
Spanish	3
International Law	1
Commercial Geography	1
Admiralty Law	½
Boilers and Power Plants	3
Measurement of Power	2
Electricity	3
Electrical Engineering	6

COLLEGE OF THE POLITICAL SCIENCES.

GENERAL STATEMENT.

The College of the Political Sciences offers systematic instruction in the various branches of the political sciences. This education is intended to give a training that will fit certain students for consular and diplomatic positions and for the public service of the United States, while imparting that general culture and equipment necessary for efficient citizenship and the intelligent grasp of public questions.

In Washington are collected the official records of the country. As the capital of the nation, Washington furnishes the best, and in many instances the only, opportunity for studying the government in actual operation. Congress, the Supreme Court, the Executive Departments, and the government of the District of Columbia afford object lessons for the study of political science. Such an atmosphere for the student of the political sciences can be found nowhere else.

Among the special advantages for study may be mentioned the Library of Congress, which contains 1,400,000 volumes and over 300,000 maps, manuscripts, etc., accessible to the students of the University; the Library of the Smithsonian Institution, enriched by its exchanges with all the countries of the civilized world; the Library of the State Department, containing more than 80,000 volumes, including nearly all the important publications relating to international law, diplomacy, and political history; the Public Library of the District of Columbia, with 90,000 volumes; the United States Bureau of Education, rich in statistical material and foreign exchanges; the excellent working libraries of the Department of Commerce and Labor, the Bureau of Statistics, the Bureau of Trade Relations, the Bureau of American Republics, the Interstate Commerce Commission, the Census Bureau, and the Department of Agriculture.

Of these special facilities, as well as those which Washington enjoys as a center of general culture, the College of the Political Sciences is planned to take a thorough and systematic advantage.

ADMISSION.

The requirement for admission to the College of the Political Sciences is the completion of two years, or its equivalent (fifteen hours per week per year), of satisfactory undergraduate work in any college or university whose entrance requirement is a four-year high school course, or its equivalent, amounting to fifteen "units." (See requirements for admission to the College of Arts and Sciences.)

Students who have completed more than two years of work in other colleges or universities of approved rank and who have received credit for that work may be admitted to advanced standing, provided their work has been of such character as to be acceptable in lieu of courses in the College of the Political Sciences.

Students who wish to pursue work leading to a graduate degree must present an acceptable Bachelor of Arts degree, or its equivalent, granted by a college or university of approved standing.

The session 1910-11 begins September 28, 1910. The academic year is divided into two parts—the first half year beginning September 28 and the second half year beginning January 30. Since many courses commence with the beginning of the second half year, a student may usually enter the College at this time without being necessarily delayed in the completion of the work requisite for graduation. Students who enter the College at the opening of the second half year's work may be graduated at the annual Winter Convocation of the University on February 22.

ADMISSION TO SPECIAL COURSES.

All courses of instruction are open to persons of maturity and suitable attainments who wish to pursue special studies without reference to a degree. Such persons are designated as special students. Upon successfully passing the examinations in the courses pursued, such students will receive certificates for work completed. But no one can be admitted to any course without satisfying the professor in charge that he has had previous training sufficient to carry on the work of the course with profit.

THE DEGREE OF BACHELOR OF ARTS.

The only undergraduate degree conferred by the University for work completed in the College of Political Sciences is the degree of Bachelor of Arts (A.B.). To be recommended for this degree the student (1) must have satisfied the entrance requirements, (2) must have been registered for at least one academic year, and (3) must have completed a total of sixty hours of class-room work (fifteen hours per week for four years). Thirty hours of this work may be taken in this College.

The Bachelor of Arts degree is granted by the University upon the recommendation of the Faculty of Undergraduate Studies. No student may receive the degree who has not been in residence at this University at least one academic year.

HIGHER DEGREES.

The higher degrees conferred by the University for work completed in the College of the Political Sciences are Master of Arts (A.M.),

Master of Diplomacy (M.Dip.), and Doctor of Philosophy (Ph.D.). Candidates for any one of these degrees must possess a Bachelor of Arts degree, or its equivalent, granted by a college or university of acceptable rank.

Candidates for admission to courses for higher degrees must present the diplomas they hold, or certificates that they have received such diplomas, to the Secretary of the University, and obtain from him application blanks. When properly filled and signed, these applications are to be submitted to the Dean of the Faculty of Graduate Studies, together with catalogues of the institutions from which they hold their degrees and certificates of their course of study at such institutions. All such applications should be accompanied by testimonials as to character and scholarship.

Candidates for the degree of Master of Diplomacy (1) must possess a knowledge of two modern languages other than English, (2) must complete twenty-four hours (twelve hours per week for two years) of class-room work, and (3) must prepare a satisfactory dissertation showing original research and investigation. But applicants for this degree who, in the attainment of their Bachelor of Arts degree, have completed the equivalent of twelve acceptable units in economics, political science, and public law may be credited with not more than twelve units toward the degree of Master of Diplomacy. Candidates for the Master of Diplomacy degree pursue their work under the general direction of the Dean of the College of Political Sciences. This degree is awarded by the University upon the recommendation of the Faculty of the College of Political Sciences.

For an outline of the requirements for the degree of Master of Arts and Doctor of Philosophy and for the regulations in regard to dissertations, the candidate is referred to pages 39-42.

Students who become candidates for the Master of Arts or the Doctor of Philosophy degree pursue their work under the general direction of the Dean of the Faculty of Graduate Studies. These degrees are awarded by the University upon the recommendation of the Faculty of Graduate Studies. No student may receive any higher degree who has not been in residence in this University at least one academic year.

LIBRARY.

The library of the College of the Political Sciences contains several thousand volumes carefully selected with special reference to library work in connection with the courses of instruction offered. It affords a practical work-room for the use and convenience of students and is open during the day and evening. The main library of the University and the law library are in adjacent buildings. The Library of Congress, the

Carnegie Library, and the Library of the Department of State are easily accessible for extended research work and special investigation.

COURSES OF STUDY.

The courses offered in this College are grouped in four sections: (1) Political Science, (2) International Law and Diplomacy, (3) Economics, and Sociology, (4) History. The courses in each section are classified in two divisions: (1) for undergraduates and graduates, (2) for graduates. The first division includes those courses which, while primarily for undergraduates, may nevertheless be pursued with profit by graduate students who have not had equivalent courses in their undergraduate work. The second division embraces courses which are offered primarily for graduate students, although undergraduates specially fitted to pursue the work may occasionally be admitted to such courses with the consent of the Dean and of the professor in charge.

Courses in this College are open to students in the College of Arts and Sciences and the Department of Law with the consent of their respective Deans. Students in the College of the Political Sciences may, likewise, with the consent of the Dean of the College, elect courses in the College of Arts and Sciences and the Department of Law.

Lectures begin at 8.00 a. m. and close at 6.30 p. m.

TEACHERS COLLEGE.

The session of 1910-11 begins Wednesday, September 28, 1910.

GENERAL STATEMENT.

The purpose of the Teachers College is to provide (a) collegiate training for teachers, (b) instruction in education as a department of science.

While research in the field of educational science, and the provision of courses which may be taken mainly for their culture value, are important features of the work of any university department of education, the principal aim of the Teachers College is the practical and professional one of training teachers. In this large field the Teachers College will restrict itself for the present mainly to the preparation of teachers for the higher grades of instruction and administration. The many excellent normal schools and training colleges are preparing teachers for efficient service in the primary and grade schools; but the need of the broad and substantial training of a college course as a preparation for high school teaching, and for responsible administrative positions, is now very generally admitted. Up to the present time it has too often happened that the college graduate who wishes to teach has been without any knowledge of the theory and practice of his vocation. The George Washington University, in common with many leading institutions, has endeavored to remedy this defect in the college training of the teacher by establishing a department for the systematic study of education in all its theoretical and practical aspects.

The aims of the Teachers College may, accordingly, be summarized as follows:

- (a) To promote the knowledge of educational science.
- (b) To fit students for the higher positions in the public school service.
- (c) To secure to teaching the rights and prerogatives of a profession.
- (d) To aid in raising the standards of educational practice, and so to increase the efficiency of public education.

ORGANIZATION.

With a view to combining to the best advantage a general college education with adequate professional training for teaching, the work of the Teachers College rests upon a preparatory course of two years' duration in the College of Arts and Sciences. The prescribed studies of this course, given below, are stated as "Group IV" (see page 56) in

the announcement of the curricula of the first and second years. The two years of professional study in the Teachers College consists of a minimum of ten units of required technical courses in education and twenty units of electives, the major part of which should be devoted to the subjects which the student wishes to teach.

Inasmuch as a large number of teachers in service are without college degrees, and a still larger number desire to supplement their professional training by taking special courses, the courses of instruction have been arranged to meet the needs both of undergraduate students and of teachers in service. The required courses constituting the prescribed work in education are given both in the morning and in the late afternoon hours, and are, therefore, easily accessible to both students and teachers from the schools. The hours are also convenient for persons employed in the Departments of Government. The completion of the curriculum of Group IV in the College of Arts and Sciences, and of the prescribed and elective courses in the Teachers College, is recognized by the granting of a Bachelor of Arts degree and a Teacher's Diploma.

Opportunity is also offered to graduate students to pursue a major or minor in Education, leading to the granting of a Teacher's Diploma in conjunction with a Master's or a Doctor's degree. In this connection attention may be called to the exceptional facilities existing in Washington for graduate study, particularly in the history of education in the United States. The extensive collections of the Congressional Library and the library and archives of the United States Bureau of Education furnish unrivaled opportunities in this department.

ADMISSION.

Applicants for admission as regular students, *i. e.*, as candidates for a degree, must present certificates showing that they have completed the first two years of the prescribed curriculum in the College of Arts and Sciences, or an equivalent course in some other institution. Teachers in service, however, and graduates of Normal Schools, who are entitled to advanced standing, may be registered in Teachers College, and conditioned in the prescribed studies in which they may be deficient, until they shall have completed those courses. But persons desirous of taking one or more of the professional courses, without becoming candidates for a degree, may be admitted as special students on the presentation of satisfactory evidence that they are qualified to pursue the work to advantage. Students who have begun their college course in another group than that entitling them to admission to Teachers College may transfer their registration to Group IV, provided that they complete all the prescribed work of the latter group.

ADMISSION TO ADVANCED STANDING.

Students who have pursued courses of study in other colleges or universities of approved rank will receive advanced credit for such work on the presentation of certificates.

Graduates of approved Normal Schools, Training Colleges, or Technical Schools, and teachers of experience who have studied privately, will be admitted to such advanced standing as the courses they have pursued warrant.

THE TEACHERS COURSE.

The full college course for the training of teachers comprises therefore the following educational divisions, the first two made up of prescribed studies and of qualified electives, the third of free electives:

(a) A foundation of 22-24 hours of general culture studies, pursued in the College of Arts and Sciences, and prescribed in accordance with the view that a teacher's preparatory training should omit no one of the principal elements of culture, supplemented by 6 to 8 hours to be elected from the same subjects, in order to make the curriculum adaptable to the varying needs of individuals.

(b) A minimum of ten hours of professional training courses.

(c) Twenty free elective hours of special information courses and further training courses.

In recognition of the professional training and the high number of prescribed hours of study, graduates of the Teachers College will receive, in addition to the Bachelor of Arts degree, a Teacher's Diploma. Both are conferred by the University.

An "hour" of study represents one hour of recitation or lecture work per week for one academic year, or its equivalent.

GRADUATION.

To be recommended for a Bachelor of Arts degree and a Teacher's Diploma, the student must complete courses of study aggregating at least sixty hours. Thirty-two or thirty-four of these hours are in prescribed studies, and the remainder in electives. The prescribed studies are the following:

(a) In general culture subjects:	Hours.
English	3
Mathematics or Science.....	3
French, German, Latin or Greek.....	3
History	3
Psychology and Logic.....	3
Philosophy, Political Economy or History.....	2 or 3
Languages or Sciences.....	5 or 6

(b) In professional subjects:		Hours.
History of Education.....		2
Principles of Education }		
Educational Psychology }		3
Child Study and School Hygiene, or }		
Principles of Secondary Education }		2
Class-room Management and Supervision, or }		
School Administration }		1
Observation and Practice Teaching.....		2

(For further definition of these requirements, see the introductory paragraph under "Education," page 105.)

The electives should be chosen with direct reference to the subjects which the student wishes to teach.

THE TEACHER'S DIPLOMA.

The Teacher's Diploma is granted in connection with the Bachelor of Arts degree upon the fulfillment of the following conditions: *a*. The student must have satisfactorily completed the courses of study defined in the preceding paragraph. *b*. He must, in the judgment of his instructors, also possess other qualifications essential to success in teaching.

The Diploma is also given in connection with higher degrees, provided a graduate student has taken a major or minor in Education, and has also satisfied the requirements *a* and *b* above, or in lieu of *a* has completed an equivalent amount of pedagogical and other work in another institution.

UNIVERSITY SCHOLARSHIPS.

Holders of the Kendall Scholarship and the University Scholarships may register in Teachers College on the same terms as in other departments of the University. For particulars see pages 60-61.

PRACTICE TEACHING.

Ample opportunity will be afforded for practice in teaching by (*a*) attendance upon observation classes conducted by experienced teachers, and (*b*) actual practice in teaching under the supervision and subject to the criticism of teacher critics.

EXPERIMENTAL WORK.

Teachers College maintains a psychological laboratory for introductory experimental work. The equipment is specially adapted to the investigation of problems of interest to students of education. The

advanced courses in experimental psychology are conducted at the Government Hospital for the Insane. These courses are modified each year to meet the requirements of the students electing them, and the facilities and equipment of this laboratory are in many respects unrivaled.

The school system of a large city, moreover, offers abundant opportunity for observation, and for the statistical study of methods and other practical educational problems.

TEACHERS COLLEGE LIBRARY.

The department library of Teachers College is supplied with the most important reference books and periodicals in Education, Psychology, and Philosophy, together with the principal Reports, etc. The reading room is open from 9 a. m. to 12 m. and from 1.30 p. m. to 6 p. m., each day of the University calendar year. In addition, books may be withdrawn over night and from Saturday to Monday. For a statement of other library facilities see "University Library," page 32.

TEACHERS APPOINTMENT BUREAU.

The Teachers College maintains a Teachers Appointment Bureau for the purpose of aiding students who are studying, or have studied, in the Teachers College, or in the College of Arts and Sciences, to secure positions as teachers. This service is performed gratuitously, in the interest both of students and of superintendents of schools and boards of education wishing to employ teachers. Communications should be addressed to the "Teachers Appointment Bureau," Teachers College, The George Washington University.

Department of Arts and Sciences.

COURSE OF INSTRUCTION.

UNIVERSITY SUBJECTS.

University Subjects are divided into three sections.

First-section courses can be taken by third or fourth year students only by permission of the Dean and the professor in charge of the subject. They may sometimes be recommended to graduate students, but are not counted toward the higher degrees. The courses in the second section are in general for advanced students, candidates for the bachelor's degrees; they serve, however, with additional work as minors for the higher degrees, provided they have not already counted toward a degree. They may be taken by students in the second year of their course only by special permission of the professor in charge. The courses in the third section are in general for graduate students only, candidates for one or other of the higher degrees. They are open to undergraduates only on the recommendation of the instructors, and no undergraduate student shall take in one year more than one course in the third section. When an announced course has not been applied for by at least three students, candidates for a degree, the instructor may withdraw the course. First-section courses are numbered 1 to 19, inclusive; second-section courses from 20 to 39, inclusive; third-section courses are numbered on from 40. The number of hours, unless otherwise specified, indicates hours per week throughout the year. The unit of credit is one hour of recitation or lecture work per week for one academic year; laboratory hours in Chemistry count one-third unit each, in other subjects one-half unit each. Laboratories and drawing-rooms will be open from 9 a. m. till 10 p. m., with competent assistants in charge to direct students. No student is admitted to a course unless he fulfills all of the preliminary requirements for the course, or otherwise satisfies the instructor that he is prepared to pursue it. Every student must make his election of courses so as to avoid conflict between the hours appointed for recitations.

ANATOMY.

W. O. OWEN, M.D.....Professor

Third Section. Primarily for Graduates.

40. Anatomy of the Nervous System. The nervous system is investigated in typical animals of the different classes, especially with

the view of gaining some insight into the phylogeny of the central nervous system in man. The growth of the brain and its physical characters as related to intelligence are investigated. The histology and embryology of the central nervous system and the sense organs are studied. A history of the guiding conceptions in neurology is to be acquired. The course is designed to inculcate students of anatomy, medicine, and psychology with a sound knowledge of the architecture and functions of the nervous system of man. Two hours.

ASTRO-PHYSICS.

FREDERICK E. FOWLE, JR.Lecturer

Third Section. Primarily for Graduates.

44. A lecture course on the astro-physical instruments employed in modern research. Mr. FOWLE.

BACTERIOLOGY AND PATHOLOGY.

FREDERICK FULLER RUSSELL, M.D.Professor

Third Section. Primarily for Graduates.

40. Bacteriology. Special studies and practical research work. Professor RUSSELL.

BIOLOGICAL SCIENCES.

PAUL BARTSCH, M.S., Ph.D.Professor

ALBERT MANN, A.M., Ph.D.Professor

ZOOLOGY.

First Section. Primarily for Undergraduates.

1. Systematic Zoölogy. I. Invertebrates. This includes lectures and laboratory work. The lectures in their scope cover all the branches of Invertebrates, and correlated with these lectures is the study and dissection of typical specimens in each group. This course is intended to familiarize the student with biological characters, classificatory laws, and the general principles of evolution. Lecture, one hour; laboratory, two two-hour periods. Professor BARTSCH.

2. Systematic Zoölogy. II. Vertebrates. This includes lectures and laboratory work. The lectures will cover the various branches of Vertebrata, and correlated with these is the study and dissection of typical specimens of each group. Open only to students having completed Course 1. Professor BARTSCH.

Second Section. For Undergraduates and Graduates.

20. Practical Zoölogy. A lecture course illustrated with lantern slides and demonstrations. In this course only beneficial and injurious animals of all classes will be considered, especial stress being laid upon the problems of preservation and extermination. The course aims to expound the economic side of zoölogy. Open to all students. One hour. Professor BARTSCH.

23. Ornithology. A systematic course embracing lectures and laboratory work. The lectures are illustrated with lantern slides, showing the home life of birds. The laboratory work consists in classifying bird skins, of which the University possesses an excellent series. Special attention is directed to the study of the birds of the District of Columbia, and frequent field excursions are made to familiarize the student with the haunts and habits of these forms. Lecture, one hour; laboratory, one two-hour period. Professor BARTSCH.

Laboratory courses in histology and physiology will be arranged for competent students.

BOTANY.

Third Section. Primarily for Graduates.

40. Original investigation in (a) Economic Botany, Materia Medica, etc.; (b) Parasitism and Monstrosities; (c) Researches in Physiology of single groups; (d) Comparative Organography. Professor MANN.

CHEMISTRY.

CHARLES E. MUNROE, Ph.D.....	Professor
FRANK WIGGLESWORTH CLARKE, Sc.D.,	Professor of Mineral Chemistry
HARVEY W. WILEY, Ph.D., M.D.,	Professor of Agricultural Chemistry
EDWARD G. SEIBERT, M.D.....	Assistant Professor of Chemistry
N. MONROE HOPKINS, Ph.D.....	Assistant Professor
EDWIN A. HILL, Ph.D.....	Assistant Professor
THOMAS M. PRICE, Ph.D.....	Assistant Professor
OTIS D. SWETT, M.S.....	Assistant Professor

First Section. Primarily for Undergraduates.

1. General Chemistry. A series of illustrated lectures, accompanied by recitations and exercises, on theoretical, inorganic, organic, and technical chemistry. Tu., Th., Sat., at 4.50. Professor MUNROE, Assistant Professor SWETT.

2. Laboratory Practice. A laboratory course for the study of the principles of chemistry and the methods of conducting chemical experi-

ments. Two three-hour periods. *Tu., Th.*, at 1.30. Professor MUNROE, Assistant Professor HILL, Assistant Professor SWETT.

3. Preparation and Study of the Properties of Chemical Substances. A laboratory course. Two three-hour periods. *Tu., Th.*, at 1.30. Professor MUNROE, Assistant Professor SWETT.

4. Assaying and Metallurgy of the Precious Metals carried on by the methods used by the Government assayers, the laboratory being fitted up on the plan of that of the United States Mint. Twelve hours, for three months. Professor MUNROE, Assistant Professor SWETT.

5. Lectures on the Principles of Analysis. One hour. Professor MUNROE.

6. Metallurgy of Iron and Steel. A course of lectures and readings. *Tu.*, at 5.40. Professor MUNROE.

7. Qualitative Analysis. A brief course intended primarily for students in engineering. Two three-hour periods. Professor MUNROE, Assistant Professor HILL, Assistant Professor SWETT.

Second Section. For Undergraduates and Graduates.

20. Qualitative Analysis. A laboratory course in the study of the properties and reactions of chemical substances, and of the means employed for their detection and identification. Three three-hour periods. Professor MUNROE, Assistant Professor PRICE, Assistant Professor SWETT.

21. Quantitative Analysis. A laboratory course in the quantitative estimation of the constituents of a specially selected and typical set of chemical substances, which are particularly adapted for teaching the student the aims and methods of quantitative chemical analysis and for imparting facility in manipulation. Four three-hour periods. Professor MUNROE, Assistant Professor PRICE, Assistant Professor SWETT.

23. Advanced course in Organic Chemistry. *Wed., Fri.*, at 4.50. Professor MUNROE, Assistant Professor SWETT.

24. Advanced course in Organic Chemistry. A continuation of Course 23. *Th., Sat.*, at 5.40. Professor MUNROE, Assistant Professor SWETT.

25. Chemistry of the Carbon Compounds. A laboratory course in the preparation and study of the properties of a characteristic series of organic compounds. Four three-hour periods. Professor MUNROE, Assistant Professor SWETT.

27. Stereo-chemistry. This course deals with the arrangements of atoms in space from a theoretical standpoint, while the student is taught how to form models by which to illustrate their arrangements. Two hours. Assistant Professor HILL.

28. Biochemistry. A laboratory course in the chemical examination of some of the chief foodstuffs, the tissues and fluids of the body, and

the products of certain organisms; also the isolation of the digestive enzymes and a study of their action *in vitro*. Three three-hour periods. Assistant Professor PRICE.

30. Physiological Chemistry. A series of lectures and recitations on the proximate principles of the human body. Two hours for one term.

31. Clinical Analysis. A laboratory course to accompany 30. Professor MUNROE, Assistant Professor SEIBERT.

Third Section. Primarily for Graduates.

40. Explosive Substances. Professor MUNROE.

41. Analytical Methods. Professor MUNROE.

43. Development of the Theory of the Constitution of the Natural Silicates. Professor CLARKE.

44. Special Researches in Agricultural Chemistry. Professor WILEY.

45. Special Researches in Electro-chemistry. Assistant Professor HOPKINS.

Students in Chemistry are invited to attend the meetings of the Chemical Society of Washington. These meetings are held on the second Thursday of each month from October to May, in the Assembly Hall of the Cosmos Club, at 8 p. m.

CLASSICAL LANGUAGES AND LITERATURES.

CHARLES SIDNEY SMITH, Ph.D. Professor

GREEK.

First Section. Primarily for Undergraduates.

A. Elementary Course. For students who have not taken Greek before matriculating. It aims to cover as much as possible of the entrance requirement in Greek, with the exception of Homer. Three hours.

B. Homer: Iliad I-IV or Odyssey V-VIII. For students who have taken Course A and desire to prepare themselves to enter Course 1. Two hours. Not given in 1910-11.

1. Herodotus (selections); Lysias (selected oration); Euripides (Alcestis); Greek prose composition. *Mon., Wed., Fri.*, at 2.30.

2. Xenophon (Memorabilia); Thucydides (Book VII); Sophocles (Antigone). *Mon., Wed., Fri.*, at 11.

Second Section. For Undergraduates and Graduates.

20. Plato (selections, including the Apology and Crito); Aristophanes (Clouds and Frogs). Three hours.

21. Demosthenes (selected orations); Lucian (selected dialogues); Homer (selections). Not given in 1910-11.

LATIN.

First Section. Primarily for Undergraduates.

1. Livy (Books I and XXI); Cicero (De Senectute); Horace (Odes and Epodes); Latin prose composition. *Mon., Wed., Fri.*, at 3.30.
2. Cicero and Pliny (selected Letters); Horace (Satires and Epistles); Martial (selections). *Mon., Wed., Fri.*, at 1.30.

Second Section. For Undergraduates and Graduates.

20. Tacitus (selections); Terence (Phormio); Plautus (Captivi). *Tu., Th.*, at 10.
21. Roman Literary Criticism: Quintilian (Book X) and Horace (Ars Poetica); Catullus, Tibullus, and Propertius. Two hours. Given in 1909-10. Not given in 1910-11.
22. Advanced Latin Composition and Reading at Sight. Practice in Latin expression and style. *Tu.*, at 1.30.

Third Section. Primarily for Graduates.

The work in this Section is designed to afford discipline in the methods of philological criticism with special reference to the interpretation of classical authors, and will include opportunities for original research on the part of competent students. In order to make the work as helpful as possible for those who expect to become teachers, the center of study each year will be one of the authors usually taught in the secondary schools. With the approval of the instructor, properly qualified Seniors may be admitted to these courses. The authors selected are as follows:

40. Vergil, and Roman Epic Poetry. Given in 1908-9. Not given in 1910-11.
41. Cæsar, and the Roman Historians. Given in 1910-11. *Tu.*, 4.50-6.30.
42. Cicero, and Roman Oratory. Given in 1909-10. Not given in 1910-11.

ECONOMICS AND SOCIOLOGY.

HENRY PARKER WILLIS, Ph.D.....	Professor
ROBERT R. KERN, A.B.....	Instructor
JOHN BALL OSBORNE, A.M.....	Lecturer
JOHN WILMER LATIMER, LL.B.....	Lecturer
JOHN L. COULTER, M.A.....	Lecturer

Second Section. For Undergraduates and Graduates.

20. General Economics. An outline course in the principles of political economy, devoted mainly to the study of production and exchange under present-day conditions. Given in two sections. First half-year *Mon., Wed., Fri.*, 11 a. m. (Section a); 5.40 p. m. (Section b), Mr. KERN.

21. The Economics of Distribution and Consumption. A continuation of Course 20, devoted mainly to the problems of rent, interest, wages, and profits, and including an examination of competition, private property, luxury, saving, and speculation, in their effects upon human welfare. Given in two sections. Second half-year. *Mon., Wed., Fri.*, 11 a. m. (Section a); 5.40 p. m. (Section b), Mr. KERN.

22. General Sociology. An outline course in the principles of sociology, devoted mainly to the study of social origins and the development of existing social institutions, with special attention to social psychology. Two hours, first half-year. *Mon., Fri.*, at 4.50. Mr. KERN.

23. Modern Social Problems. A further analysis of modern social conditions with special studies of current questions in sociology. Prerequisite, the course in general sociology. Two hours, second half-year, *Mon., Fri.*, at 4.50. Mr. KERN.

24. The History of Economic Thought. A review of the development of economics as a science from the earliest times to the present. Lectures and library readings. Two hours, first half-year. *Wed.*, 4.50 to 6.30. Mr. KERN.

25. Contemporary Economic Theory. An advanced course in the theory of economics in continuation of the preceding; a review of current economic doctrines with critical analysis. Two hours, second half-year. *Wed.*, 4.50 to 6.30. Mr. KERN.

26. Public Finance. A course in the development of budgetary and fiscal methods and principles. The history and tendencies of public expenditure under the Federal and State governments. The theory of taxation; administration of public domains, and industries; public debts. First half-year. *Tu., Th.*, 10 a. m. Professor WILLIS.

27. Money and Banking. The history and theory of money; the production of the precious metals; the theory of prices and measurement of price fluctuations; monetary systems; the relation of the Treasury system to our money supply; the theory of credit and banking; the national bank system of the United States and the banking system of foreign nations. Second half-year. *Tu., Th.*, at 10 a. m. Professor WILLIS.

28. Accounting. General Principles of accounting; the more important forms of commercial paper and business methods. A text-book on accounting and hand-books dealing with accounting forms and methods are used as guides. Much of the work is based upon library readings.

The course terminates with a study of the accounts of representative kinds of business and the methods of accounting and auditing applicable thereto. First half-year. Not given in 1910-11. Professor WILLIS.

29. Corporation Finance. The various sorts of corporation securities; methods of organizing and financing modern industrial enterprises; the nature of investment and speculation; stock and produce exchanges; the effect of speculative and investment operations on the staple industries. Second half-year. Not given in 1910-11. Professor WILLIS.

30. Theory and Practice of Statistics. A conference course in the principles of statistics, with concrete examples of their applications; the graphic method; the use of averages; index numbers; and the special application of statistics to insurance; government statistical methods and publications in the United States and in the principal foreign countries. Lectures and reading. Two hours, first half-year. Professor WILLIS.

31. International Trade. A discussion of the theory and mechanism of international trade, followed by a study of the trade relations of the United States and the conquest of foreign markets. Two hours, first half-year. *Tu.*, 4.50 to 6.30 p. m. Mr. OSBORNE.

32. Commercial Policies. Study of the trade policies of the principal commercial powers; history of the policy of reciprocity; commercial treaties and agreements of the United States; doctrine of the most favored nation; tariffs of the United States and the principal foreign countries, particularly the double tariff system. Two hours, second half-year. *Tu., Fri.*, 8 a. m. Mr. OSBORNE.

33. Commercial and Maritime Law. An outline of the principles of the law relating to commercial transactions generally, including those peculiar to the sea, with more especial reference to the subjects of contracts, sales, bailments, agency, partnership, negotiable instruments, and common carriers. Second half-year. *Tu., Th., Sat.*, 4.50 p. m. Mr. LATIMER.

34. Commercial and Industrial History. The rise and progress of commerce from antiquity to modern times, with particular emphasis on the effects of commerce upon civilization and the relations between commercial and political development. The rise and progress of economic activities in the English colonies of North America and of the agricultural, commercial, and industrial growth of the United States. First half-year. Not given in 1910-11.

35. Modern Business Organization. A study of the modern business, the present modes of producing and distributing commodities, modes of controlling prices, systems of retailing, advertising, etc. Second half-year. Not given in 1910-11.

36. Commerce and Industries and Transportation of the United States. A study of the resources, industries, business activities, and internal and foreign commerce of the United States; the products of

the various sections; the transportation systems by which they are interchanged or assembled for manufacturing and redistribution; manufacturing systems; domestic exchange; distribution to foreign countries; the markets in which exports are sold and from which imports are drawn. Two hours, first half-year. *Tu., Th., 5.40 p. m.* Professor WILLIS.

37. Commercial Geography. The products, industries, and commerce of the various countries and sections of the world; the exchanges between climatic sections and between the great producing and manufacturing sections and countries of the world; the staple articles of commerce, their places of production and sale; manufacturing industries and the distribution of their products; the transportation and financial systems by which interchanges are facilitated; a comparative view of the commercial, economic, and financial conditions in the various sections and countries of the world. Two hours, second half-year. *Tu., Th., 5.40 p. m.* Professor WILLIS.

38. History and Literature of Agricultural Industries. Open to juniors and seniors who have completed course 1 or 2. Historic development of, and attitude toward, agriculture in ancient, mediæval and modern times, and comparison of systems with reference to stage of economic development and geographic conditions. A more detailed study of the history of agriculture in the United States. Lectures, assigned readings, reports on special topics, quiz. First half-year. Hours to be announced. Mr. COULTER.

39. Economics of Agricultural Industries. Economic principles which underlie farm and estate management, land values, and prices of farm produce; preparations of produce for market, market and transportation problems. The size, ownership, organization and labor system of farms as bearing on economic efficiency and social and political conditions. Farm organizations and coöperation. Lectures, assigned readings, reports on special topics, quiz. Second half-year. Hour to be announced. Mr. COULTER.

Third Section. For Graduates.

40. Taxation. Taxation, its administration and organization. The legal problems which arise in connection with taxation will be studied through typical cases. Two hours, second half-year. Not given in 1910-11. Professor WILLIS.

41. Advanced Accounting. A special study of accounting principles in their application to specified classes of business. Prerequisite—the course in accounting. First half-year. Not given in 1910-11. Professor WILLIS.

42. Insurance. The historical development of insurance; its economic aspects; fire, accident, and life insurance from the standpoint of inter—

nal organization; rates; policies. Two hours. Second half-year. Professor WILLIS.

43. Labor Problems. A brief sketch of the labor movement in the United States and of the aims and methods of trade unions, followed by a discussion of such problems as: Child labor; dangerous occupations; workingmen's insurance against sickness, old age, accidents, and unemployment; strikes and industrial conflicts; conciliation and arbitration; collective bargaining. Two hours, second half-year. Not given in 1910-11. Mr. KERN.

44. Transportation Problems. Detailed studies in the rate problem connected with certain commodities, the relation of express companies to railways, coördination of waterways with railways, ocean transportation, export and import rate discriminations, and current topics. Open to those who have taken the course in Transportation or its equivalent. Seminary methods to be followed in part. Two hours, throughout the year. Not given in 1910-11. Professor. WILLIS.

ENGINEERING.

*PHILANDER BETTS, M.S., E.E. Assistant Professor of Electrical Engineering
 EDWIN V. DUNSTAN, C.E. Assistant Professor of Civil Engineering
 OSCAR A. MECHLIN, C.E. Assistant Professor of Civil Engineering
 F. CHARLES STARR, B.S. Assistant Professor of Civil Engineering
 CHARLES W. MORTIMER, M.E. Assistant Professor of Electrical Engineering
 HAYNER H. GORDON, E.E. Instructor in Mechanical Engineering
 ROBERT W. MORSE, S.B. Instructor in Mechanical Engineering
 MARK R. WOODWARD, E.E. Instructor in Electrical Engineering

APPLIED MATHEMATICS.

Second Section. For Undergraduates and Graduates.

20. Analytical and Applied Mechanics. (1) Statics: including the composition, resolution, and equilibrium of forces; center of gravity; friction; machines. (2) Kinematics and Kinetics: including rectilinear and curvilinear motion; motion under action of variable forces and in resisting media; constrained and rotatory motion; impact; work and energy; moment of inertia. Four hours a week, first half-year. Assistant Professor DUNSTAN.

21. Hydraulics. The theoretical principles of hydraulics: including hydrostatics, flow through orifices, over weirs, through pipes and in open channels, and the dynamic pressure of water. Four hours a week, first half-year. Assistant Professor DUNSTAN.

* Absent on leave.

22. Mechanics of Materials and Theory of Elasticity: including elastic and ultimate strength and deformation; simple, cantilever and continuous beams; columns, torsion; combined stresses; compound columns and beams: including reinforced concrete; resilience; work; fatigue; mathematical theory of elasticity. Four hours a week, second half-year. Assistant Professor MECHLIN.

CIVIL ENGINEERING.

First Section. Primarily for Undergraduates.

1. Surveying and Mapping. This course includes the theory and use of instruments; land, topographic, hydrographic, mining, city, and geodetic surveying; measurement of volumes, projection of maps, etc. Two hours a week. Field work, usually on Saturday. Assistant Professor STARR.

2. Railroad Engineering. Railroad curves and earthwork; location of about two miles of railroad, including reconnaissance, preliminary and final locations, construction of contour maps and profiles, computation of earthwork, design of culverts, etc.; laying out curves; track work, etc. Two hours a week. Field work, usually on Saturday.

3. Highways and Pavements. Location of highways; construction, improvement and maintenance of roads and pavements; curbs, gutters, sidewalks. One lecture and one design period during the first term. Assistant Professor MECHLIN.

4. Materials of Construction. A study of the properties of stone, brick, cement, concrete, wood, iron, steel, etc., with reference to processes of manufacture. The course is supplemented by a number of practical tests made by the students. Two lectures for first term and one lecture and one laboratory period for second term. Assistant Professor MECHLIN.

5. Surveying Instruments. A two-months' course for Mechanical and Electrical Engineering students, covering the use of the compass, transit, and level. Lectures and field exercises, two hours per week. Assistant Professor STARR.

6. Foundations. A two-months' course for Mechanical and Electrical Engineering students, covering the general principles of foundation construction and the materials used. Two hours a week. Assistant Professor MECHLIN.

8. A course in Practical Astronomy for Civil Engineering students. Special attention is given to the methods of determining latitude, longitude, azimuth and time with the engineer's transit; observations for each being a required part of the course. Two lecture-recitation periods per week for one term. Assistant Professor STARR.

Second Section. For Undergraduates and Graduates.

20. Masonry Construction. A course in the use of cement, brick, stone, and concrete, the design of foundations, retaining walls, dams, bridge piers and arches. Included in this is a short course in stereotomy. Two lectures and two design periods per week. Assistant Professor MECHLIN.

21. Hydraulic Engineering. The design and construction of water power plants and irrigation works. Flow of rivers; rainfall and runoff; methods of development; hydraulic motors; power transmission. Irrigation plans; distributing systems; water rights and irrigation law. Four lectures and two design periods per week, second term. Assistant Professor DUNSTAN.

22. Theory of Structures. A course covering the determination of stresses in framed structures by graphical and by analytical methods. The first term is devoted to beams and roof trusses; the second to bridge trusses under uniform and wheel loads. Three lectures and two design periods per week. Assistant Professor DUNSTAN.

23. Theory of Structures. The theory of steel design; the design of a roof truss, of a plate girder and a pin connected bridge truss and a study of the theory and design of suspension, continuous, cantilever, and arch bridges, and the details of steel-mill and office-building construction. Three lectures and two design periods per week. Assistant Professor MECHLIN.

24. Sanitary Engineering. This course treats of the drainage of buildings and lands; the treatment and disposal of sewage and the sewerage of cities and towns; public water supply and methods of water purification. Three lectures and one design period per week. Assistant Professor MECHLIN.

Third Section. Primarily for Graduates.

40. Advanced Masonry. A course in the theory and design of reinforced concrete structures. Assistant Professor MECHLIN.

41. Advanced Masonry. The theory of retaining walls and arches. Assistant Professor MECHLIN.

42. Testing of Materials. This course involves original research upon assigned topics. Assistant Professor MECHLIN.

43. Water Power Development. A comparative study of the principal water power developments of the United States and Europe. The course consists largely of assigned readings and reports thereon. Assistant Professor DUNSTAN.

ELECTRICAL ENGINEERING.

First Section. Primarily for Undergraduates.

1. Elementary Mathematical Theory of Electricity and Magnetism, with special attention to the needs of engineering students. Three hours a week, first term. Assistant Professor MORTIMER.

2. Direct-current motors and generators. Covers the laws of the magnetic circuit as applied to the dynamo. Students are required to design a direct-current machine. Three hours a week, second term. Assistant Professor MORTIMER.

3. Elements of Electrical Engineering. Text-book: Tyson Sewell's "Elements of Electrical Engineering." Two hours a week. Assistant Professor MORTIMER.

4. Electrical Measurements. A laboratory course for Juniors. Selected experiments. Foster's Hand-book and special laboratory notes are used for reference. Six hours a week, first term. Assistant Professor MORTIMER.

5. Electrical Laboratory. Experiments and tests involving the operation of direct-current dynamos and motors, including tests of motors in service, operating elevators, street cars, and machinery of various kinds. Test-book: Sever and Townsend's "Laboratory and Factory Tests in Electrical Engineering." Six hours a week, second term. Assistant Professor MORTIMER.

6. Industrial Electricity. A practical course intended for Juniors in Civil Engineering, embracing the selection and operation of electrical machinery, electric railways and other applications of electric motors. Two hours a week for the first term.

7. Electrical Engineering. A course in theoretical and applied electricity intended for Seniors in Mechanical Engineering. It embraces the selection and operation of electrical machinery, the location, construction, and operation of power plants, electric railways and transmission lines, the use of electric motors for driving machinery, and the working of storage batteries, elevators, hoists, and cranes. Three hours a week.

8. Electrical Design. A course for Seniors in Electrical Engineering, embracing calculation and design of electrical machinery and accessories, including switchboards, rheostats, instruments, and arrangement of same. One recitation period and one drawing period throughout the year.

Second Section. For Undergraduates and Graduates.

21. Alternating Current Theory and Machinery. A course for Seniors in Electrical Engineering, covering the principles of single as well as polyphase currents, including study of machines, circuits, transformers, etc. Four hours a week, Senior year. Assistant Professor MORTIMER.

22. Electrical Distribution. A course for Seniors in Electrical Engineering, covering the whole field of distribution of electricity for light and power. Text-book: Crocker's Electric Lighting; second volume, "Distribution System." Two hours a week.

23. Electrical Applications. A course for Seniors in Electrical Engineering, covering the more important applications of electricity, such as motive power, including elevators, hoists and machine drive, telephony, telegraphy, electro-metallurgy, etc. One hour a week.

24. Advanced Laboratory Work for Seniors in the Electrical Engineering Course. Covers test and experimental work with direct and alternating currents, tests of machines, circuits, transformers, circuits containing inductance and capacity, measurement of power in alternating current circuits, plotting of curves, etc. Test-book: Sever and Townsend's "Laboratory and Factory Tests in Electrical Engineering," with Foster's Electrical Engineer's Hand-book for general reference. Six hours a week. Assistant Professor MORTIMER.

25. Inspection of Plants and Industrial Works. In the vicinity of Washington and Baltimore are a number of modern electric lighting and street railway plants, telephone exchanges, telegraph operating rooms, Government laboratories devoted to special work, etc., which afford students of Electrical Engineering an opportunity to familiarize themselves with nearly all types of apparatus in use. The visits are followed by class discussion based on written descriptions submitted by the students.

26. Electric Lighting and Illumination. A course for Seniors in Electrical Engineering covering the subject of electric lighting and illumination, including detailed study of different types of lamps, shades, arrangement of light sources, effect of walls, etc. Two hours per week, first term.

27. Electric Railways. A course for Seniors in Electrical Engineering covering the theory and practice of modern, direct and alternating current railways. Two hours a week, second term.

Juniors and Seniors in Electrical Engineering are required to attend the monthly meetings of the Washington Branch of the American Institute of Electrical Engineers held at the University.

Third Section. Primarily for Graduates.

41. Advanced Dynamo Design. This comprises the more rigid calculation of the magnetic circuit, the estimation of the electrical and mechanical losses, together with an exposition of the elements of mechanical design. Assistant Professors BETTS and MORTIMER.

42. Advanced Course in the Mathematical Theory of Alternating Currents. Assistant Professors BETTS and MORTIMER.

43. Advanced Course in Polyphase Currents. Assistant Professors BETTS and MORTIMER.

44. Advanced Laboratory Work, Alternating (including Polyphase) Current Apparatus. Assistant Professors BETTS and MORTIMER.

GRAPHICS.

First Section. Primarily for Undergraduates.

1. Mechanical and Freehand Drawing. A general course embracing the care and use of instruments; orthographic and isometric projections; sections and intersections; curve plotting; sketching of simple machine details; freehand lettering; principles of working drawings. Six hours a week in the drawing-room. Assistant Professor STARR.

2. Advanced Mechanical Drawing. A course in working drawings especially designed for Electrical and Mechanical Engineering students. Drawing-room rules and practice; conventional forms and standards; arrangement of views and sections; freehand shop-sketches; detailing from sketches, models and general drawings; proportioning by empirical formulas. Six hours a week in the drawing-room.

8. Descriptive Geometry. A study of the representation of lines, surfaces, and solids, and of their relations; tangencies, intersections, and developments; warped surfaces; shades and shadows; original construction problems. Two lectures and one drawing period per week. Assistant Professor STARR.

10. Topographic Drawing. A general course in plotting, topographic symbols, and lettering to accompany the work in surveying. One drawing period per week. Assistant Professor STARR.

Third Section. Primarily for Graduates.

40. Advanced Graphic Statics. A study of the graphical analysis of higher structures, with special reference to the method of influence lines. Assistant Professor DUNSTAN.

MECHANICAL ENGINEERING.

First Section. Primarily for Undergraduates.

1. Mechanism. A course in the systematic study of the kinematics of machinery, in which mechanical movements are reduced to scientific analysis. Carefully developed problems and diagrams of changes of position and speed in mechanisms are constantly used.

Some attention is given to the design of gear teeth, and valve gears for steam engines, and to the necessary theory for such design. Two lecture-recitation hours and two drawing hours per week during the Sophomore year.

4. Woodwork. Four hours per week in the shops during the Sophomore year.

5. Metal Work. Six laboratory hours per week during the Junior year. Electrical engineering students are given a modified course of three hours per week.

6. Engineering Drawing. This course provides for the application of the principles taught in the courses of Mechanism and Steam Engineering to specific problems. Practice is given in the design of valve gears and quick return motions, and in the determination of velocity diagrams for special engine and other linkages. There is also included the complete working drawings for a steam boiler. Six drawing hours per week during the Junior year.

7. Machine Design. This course is an application of principles already acquired to problems in design, each student being required to complete every detail of the design undertaken.

The subjects taken as design problems are: The design of a boiler; permanent and temporary fastenings for machine parts; a crank; a large shaft with pulley and gear wheels, rotating and sliding pieces, etc. The constructive details and calculations are discussed and the limitations of theoretical and empirical formulas pointed out. Results are made to conform with experience and the best practice. One lecture-recitation hour and three drawing hours per week during the Senior year.

9. Engineering Laboratory. A course of practical work in testing general engineering apparatus for efficiency. The work consists in indicating steam engines; determining the evaporative efficiency of boilers; tests on the strength of materials; measurement of the flow of water; gas-engine brake tests; refrigeration tests, and fuel value determinations. Six laboratory hours per week for the last half of the Junior year. Not given in 1910-11.

10. Engineering Laboratory. This course is a completion of Course 9. Six hours a week during the Senior year. Not given in 1910-11.

12. Elements of Steam Engineering. A course designed for the needs of Civil Engineering students. It deals briefly with valve gears, power plant accessories, thermodynamics, steam engines, steam pumps, and steam boilers. Two lecture-recitation hours per week during the Senior year. Not given in 1910-11.

Second Section. For Undergraduates and Graduates.

20. Steam Engineering. The first half-year of the course deals with the principles of Thermodynamics; the properties of gases and vapors, especially steam; the flow of steam and other fluids, and the steam injector. The application of the above principles is discussed, and the simple, compound, and multiple expansion steam engines are studied.

The last half-year of the course is devoted to the study of steam boilers and power plants, and their accessories. A design, with plans and specifications, for a power plant of industrial proportions is required from each student. Three lecture-recitation hours per week during the Junior year. Mr. GORDON.

22. Internal Combustion Motors. This course will deal with the theory, design, and practice concerning gas, gasoline, and other engines. The work will include: (1) The fuels employed, their energy content, and its conversion into mechanical work; (2) the cycle of operations of the heat medium, with details of method of transforming heat into work, and types of motor; (3) the practical details of operation, mixing the charge, carburation, ignition, and governing; (4) the manipulation and practice, and a discussion of economy and performance from tests. The design of some simple type of motor will be completely worked out and discussed. Three lecture-recitation hours per week for the first half of the Senior year. Not given in 1910-11.

23. Hydraulic Machinery. This course provides for an elementary study of hydraulic prime movers and pumping machinery. It includes a discussion of the theory and design of turbines and turbine blades for low and high heads, and turbine governors.

The course will also treat of impulse wheels; water motors of the piston type; machinery for the utilization of hydraulic pressure; hydraulic pressure pumps, and hydraulic presses; hydraulic tools; pumps operated by steam, electricity, or power; and high duty pumps and water meters. Two lecture-recitation hours per week for the first half of the Senior year.

25. Compression and Refrigeration Machinery. A course in which the principles of thermodynamics are applied to the commercial methods of compressing air and securing artificial refrigeration. The work will also include the mechanical principles concerned in the design of air compressors as well as the transmission of air in high-pressure piping. Three lecture-recitation hours per week in the last half of the Senior year. Not given in 1910-11.

28. Industrial Management. A course dealing with the business systems of manufacturing establishments.

The work includes a study of the organization and relations of the various departments of an industrial establishment, both in the office and in the workshop. It also discusses the conduct of accounts, the methods of superintendence and of compensating labor, the determination of the costs of production, and the effect on costs of different systems of distributing indirect expenses. Two lecture-recitation hours per week for the last half of the Senior year. Not given in 1910-11.

ENGLISH.

WILLIAM ALLEN WILBUR, A.M.....	Professor
*DE WITT C. CROISSANT, A.B.....	Assistant Professor

First Section. Primarily for Undergraduates.

1. English Rhetoric. A study of the principles of self-expression through language with practice in composition. *Tu., Th., Sat.*, at 10. Professor WILBUR.

2. English Rhetoric. Parallel with Course 1. *Mon., Wed., Fri.*, at 4.50. Professor WILBUR.

NOTE.—Credit for Course 1 or 2 is requisite for admission to any other course in English.

Second Section. For Undergraduates and Graduates.

20. Humanistic Studies: Seventeenth and Eighteenth Centuries. "The Faerie Queene;" "Advancement of Learning," Book I; "The Compleate Angler;" "Pilgrim's Progress;" "Religio Medici;" "Sir Charles Grandison;" "Evelina;" "The Prelude." *Mon., Wed., Fri.*, at 5.40. Professor WILBUR.

21. Humanistic Studies: Nineteenth Century. "Endymion;" "Pride and Prejudice;" "The English Mail-Coach;" "Sartor Resartus;" "Adam Bede;" "Vanity Fair;" "Idylls of the King;" "Travels With a Donkey in the Cévennes;" "Saul." *Tu., Th., Sat.*, at 9.00. Professor WILBUR.

22. Shakespeare. The Comedies and the English Historical Plays. *Mon., Wed., Fri.*, at 1.30. Professor WILBUR.

23. Shakespeare. The Tragedies. *Tu., Sat.*, at 4.50. Professor WILBUR. The Temple edition of Shakespeare is recommended.

Third Section. Primarily for Graduates.

44. Seminary in English Literature. "The Ring and the Book." *Th.*, 3.30 to 5.30. Professor WILBUR.

GEOLOGY AND MINERALOGY.

GEORGE P. MERRILL, Ph.D.....	Professor
R. S. BASSLER, Ph.D.....	Assistant Professor

First Section. Primarily for Undergraduates.

1. Mineralogy. Crystallographic, descriptive, and determinative mineralogy. This course is designed with especial reference to minerals as rock constituents or segregated as ore deposits. It includes,

* Absent on leave.

therefore, a discussion of not merely the crystallographic and theoretical, but the practical side of the subjects as well. Whenever possible, it should be considered as introductory to the courses in either systematic or economic geology. *Tu., Th.*, at 5.40.

2. Geology. Systematic geology; dynamical, structural, and stratigraphical. The course is designed to form a part of a general-culture course, or a preliminary course for those intending to make a specialty of geology. It includes lectures, recitations, laboratory and field work so far as hours will permit. Paleontology is treated as a branch of geology, having especial reference to stratigraphy and correlation. Text-books: Scott's Introduction to Geology, Merrill's Rocks, Rock Weathering, and Soils. *Mon., Fri.*, at 5.40.

Second Section. For Undergraduates and Graduates.

20. Economic Geology. The course covers the subjects comprised under: (1) Mineral veins and metalliferous deposits, their mode of occurrence, origin, and classification; (2) the ores of iron, copper, lead, zinc, tin, silver, gold, mercury, antimony, etc.; and (3) the non-metallic minerals as the coals and hydrocarbon compounds; salts and materials used in chemical manufactures; abrasive, refractory, and fictile materials, pigments, gems, ornamental stones, building stones, limes, cements, and mineral waters. Text-books: Weed's Translation of Beck's Nature of Ore Deposits; Merrill's Stones for Building and Decoration and the Non-metallic Minerals. *Mon., Fri.*, at 4.50.

21. Paleontology. A course in lecture and laboratory work on the biological and geological relations of the more important types of animals and plants, with especial reference to their value in stratigraphic geology. Two hours.

Third Section. Primarily for Graduates.

Advanced study in Geology, both systematic and applied, is arranged to cover two years.

40. Advanced Geology and Paleontology. The student in this first-year course may devote his time largely, if necessary, to perfecting himself in methods; to general work in the laboratory and in the field; to the examination of geological materials, and to familiarizing himself with the literature of the subject.

41. Advanced Paleontology and Stratigraphic Geology. A continuation of Course 21. Besides the study of paleontological methods, the student is expected to pursue some special line of investigation in order to fit himself for original research.

GERMANIC LANGUAGES AND LITERATURES.

HERMANN SCHOENFELD, Ph.D., LL.D.....Professor
 A. F. W. SCHMIDT, A.M.....Assistant Professor

First Section. Primarily for Undergraduates.

1. Elementary. The essentials of German grammar; translation of prose and poetry; composition and dictation. This course is open only to beginners, and the work done is equivalent to that of a two years' course in high schools and academies of good standing. *Tu., Th., Sat., at 11.* Professor SCHOENFELD.

2. Parallel with Course 1. *Tu., Th., Sat., at 4.50.* Assistant Professor SCHMIDT.

3. Selected texts from the foremost contemporary authors will be read and one or more of the German classics carefully studied. The work in grammar and composition done in elementary German will be continued on a more advanced plane, with special emphasis on syntax, word-formation, and the relationship of German and English. This course is equivalent to the advanced German of the admission requirements, and it is open only to students who have passed Course 1 or 2, or have satisfied the admission requirement in elementary German. *Mon., Wed., Fri., at 11.* Professor SCHOENFELD.

4. Parallel with Course 3, except that in the second term scientific German is read. *Tu., Th., Sat., at 5.40.* Assistant Professor SCHMIDT.

5. Advanced course in German syntax; principal difficulties of the language; idioms; synonyms; extensive translations, of the best English prose into German; essays; selected advanced prose; classical reading and literature; German history. Special training for advanced students in the historical and economic departments. Open to students who have passed Course 3 or have satisfied the admission requirement in advanced German. *Mon., Wed., Fri., at 1.30.* Professor SCHOENFELD.

Second Section. For Undergraduates and Graduates.

20. German Literature in the first half of the nineteenth century; its social and political aspects; special study of Kleist, Uhland, Heine; the Austrian School; the Romanticists; classicism till Goethe's death; essays, lectures, and collateral reading. *Mon., Wed., Fri., at 10.* Professor SCHOENFELD.

21. Goethe's Faust. *Tu., Th., at 10.* Professor SCHOENFELD.

The intervening periods of Modern German Literature will be studied during the subsequent academic year.

Third Section. Primarily for Graduates.

40. German Literature in the sixteenth century. Braune's Neudrucke Deutscher Literaturwerke. Humanism and Reformation, with special

reference to Italian and French influences and their historical basis. Original readings from the Humanists, Hans Sachs, Fischart, and Luther's works. The reformatory projects of Cardinal Nicolaus Cusanus and of Erasmus, Hutten, and Reuchlin. Professor SCHOENFELD.

41. German Literature in the twelfth and thirteenth centuries, with special regard to the Nibelungen lay, the Gudrun saga, Wolfram von Eschenbach. The lyrics of Walther von der Vogelweide. The grammatical aspects of the classics of the first period of bloom. Professor SCHOENFELD.

The other phases of older German literature will be studied in subsequent years, so that the general range of the history of German Literature may be covered every three years.

47. Gothic. Introduction to comparative Indo-European grammar. Two hours. Assistant Professor SCHMIDT.

48. Old High German. The development of the German language. Two hours. Assistant Professor SCHMIDT.

49. Old Norse. The Eddas. Two hours. Assistant Professor SCHMIDT.

Only one of the foregoing three courses (47, 48, 49) is given in any one year.

For notice of the Richard Heinzel Germanic Library, see page 32.

HISTORY.

CHARLES CLINTON SWISHER, Ph.D., LL.D.....	Professor
*JAMES FREDERICK PEAKE, A.M.....	Assistant Professor
GEORGE MORTON CHURCHILL, A.M.....	Instructor
HANS FRED'K ARTHUR SCHOENFELD, A.M.....	Instructor
LESLIE C. McNEMAR, A.B.....	Instructor
WILLIAM HAMILTON, Ph.D.....	Lecturer

First Section. Primarily for Undergraduates.

1. Mediæval History. A history of the settlement of the Germanic tribes within the territory of the Empire, with a study of feudal institutions and the development of the modern state. Text-books with assigned readings. *Mon., Wed., Fri.*, at 4.50. Mr. SCHOENFELD.

2. Modern European History. A study of the European states under the new conditions resulting from the discovery of America and the opening of the oriental trade routes, extending through the period of the French Revolution; with a general survey of the more important movements of the Nineteenth century. Lectures and collateral readings. *Mon., Wed., Fri.*, 3.30. Professor SWISHER.

6. Modern European History. Largely parallel with course 2, in-

* Absent on leave.

cluding, however, a more detailed study of recent issues. *Mon., Wed., Fri.*, 4.50. Professor SWISHER.

Second Section. For Undergraduates and Graduates.

23. European History, 1815 to 1870. Text-book, lectures, and reports on collateral reading. Besides the history of Europe proper much attention is given to matters of larger European interest, especially to colonization and international relations with reference to South America, Asia, and Africa. First half-year. *Mon., Wed., Fri.*, at 5.40 p. m. Mr. McNEMAR.

24. European History, 1870 to the present. Continuation of the preceding, studying the most recent developments with special attention to the forms of government, political questions, and current issues. Second half-year. *Mon., Wed., Fri.*, 5.40 p. m. Mr. McNEMAR.

25. English Constitutional History. In alternate years. Not given in 1910-11. Mr. CHURCHILL.

26. American Political History. A general course in American History designed as a preparation for specialized work, or for students having a limited time to devote to the subject. Lectures, text-books, and reports upon assigned readings. *Tu., Th.*, at 2.30, with a third hour at the convenience of the instructor. Professor SWISHER.

30. American Constitutional History. A history of the origin and development of the Federal Constitution of 1789, with a study of its interpretation under the pressure of party issues, extending through the periods of division and reunion. Lectures, text-books, and collateral readings, *Mon. and Fri.*, at 4.50. Mr. CHURCHILL.

31. American Constitutional History since the Civil War. The constitutional results of the Civil War, as illustrated in the decisions of the Supreme Court during the past half century. *Tu. and Th.*, at 3.30, with an additional hour at the convenience of the instructor. Professor SWISHER.

33. Current History. A discussion of political questions of the day, with special reference to their origin and historical significance. Lectures throughout the year. *Sat.*, at 11. Professor SWISHER.

Third Section. Primarily for Graduates.

42. A History of Party Government. The development of the party system and the influence of party leaders and party issues in the United States; a research course based upon the study of political platforms and campaign literature. *Tu. and Th.*, at 4.50. Professor SWISHER.

43. American Colonial History. A history of the development of representative government under the provincial charters with a detailed

study of the social, economic, and political conditions leading to the Revolution. Not given in 1910-11.

44. Seminary Work. The results of individual research, conducted by graduate students upon assigned topics, will be discussed at the weekly meetings of the seminars of American and Modern European History.

Undergraduate students properly qualified by previous study, who desire to do intensive work with a view to gaining fuller information upon special periods or facility in the use of historical materials, may with the approval of the instructor, be admitted to the historical seminars.

INTERNATIONAL LAW AND DIPLOMACY.

JAMES BROWN SCOTT, J.U.D.....	Professor
CHARLES C. SWISHER, LL.D.....	Professor
LESLIE C. McNEMAR, A.B.....	Instructor

Second Section. For Undergraduates and Graduates.

20. Principles of International Law. A detailed course in the nature, sources, and sanctions of International Law, based upon the study of cases and reports, supplemented by letters and assigned readings. First half-year, *Mon., Wed., Fri.*, 8 a. m. Second half-year, *Mon., Wed.*, 8 a. m. Professor SCOTT.

21. The Elements of Diplomacy. A study of the genesis and organization of the Department of State; the diplomatic service; diplomatic usage; negotiation of treaties; methods and traditional principles of our foreign policy. First half-year. *Tu., Th.*, 8 a. m. Professor SCOTT.

22. The Consular Service. A general survey of the rise, development, organization of the consular service; consular conventions; the rights, duties and methods of procedure of consular officers; comparative study of modern consular systems. Two hours. Second half-year. *Tu., Th.*, 8 a. m. (section *a*), 11 a. m. (section *b*). Mr. —.

25. History of European Diplomacy, 1648 to 1814. Lectures, with collateral readings, investigations, and reports. Three hours, first half-year. Not given in 1910-11. Mr. McNEMAR.

26. History of European Diplomacy, 1814 to the present. A continuation of the preceding. Three hours, second half-year. Not given in 1910-11. Mr. McNEMAR.

29. History of American Diplomacy. A general history of American foreign relations from the Treaty with France in 1778, with a special study of some of the more important questions of American foreign policy. A research course with readings from treaties and diplomatic correspondence. Throughout the year. *Mon., Fri.*, 2.30 p. m. Professor SWISHER.

Third Section. Primarily for Graduates.

44. Conflict of Laws or Private International Law. A course dealing with private law in its international aspects. Among the topics treated are marriage and divorce, guardianship, wills, and the administration of estates, bankruptcy, and foreign judgments. Open only to students who have had instruction in the fundamental subjects of American Law. Four hours, second half-year. (Hours to be announced on Law Schedule.) Professor LORENZEN.

MATHEMATICS.

HOWARD LINCOLN HODGKINS, Ph.D. Professor
 ASAPH HALL, JR., Ph.D. Professor
 ———, —..... Instructor

First Section. Primarily for Undergraduates.

3. Solid Geometry; College Algebra; Plane Trigonometry. *Mon., Wed., Fri.*, at 9. Professor HODGKINS.

4. Algebra; Plane Trigonometry. Three hours a week.

6. Solid Geometry; College Algebra; Plane Trigonometry. *Tu., Th., Sat.*, at 5.40. Professor HODGKINS.

9. Trigonometry; Analytic Geometry. *Mon., Wed., Fri.*, at 10. Professor HODGKINS.

12. Trigonometry; Analytic Geometry. *Mon., Wed., Fri.*, at 5.40.

Second Section. For Undergraduates and Graduates.

20. Differential and Integral Calculus; Elements of Differential Equations. *Tu., Th., Sat.*, at 4.50. Professor HODGKINS.

21. Differential and Integral Calculus; Elements of Differential Equations. *Tu., Th., Sat.*, at 9. Professor HODGKINS.

Third Section. Primarily for Graduates.

40. Differential Equations. Professor HODGKINS.

48. Celestial Mechanics. Theory of central forces; theory of parabolic and elliptic orbits. Lectures, with reading from the works of Gauss, Oppolzer and Moulton. Professor HALL.

PHILOSOPHY, PSYCHOLOGY, AND EDUCATION.

WILLISTON S. HOUGH, Ph.M. Professor
 SHEPHERD IVORY FRANZ, Ph.D. Professor
 WILLIAM CARL RUEDIGER, Ph.D. Assistant Professor
 WILLARD S. SMALL, Ph.D. Lecturer
 STEPHEN ELLIOTT KRAMER, A.M. Lecturer
 ———, —..... Laboratory Assistant

PHILOSOPHY AND PSYCHOLOGY.

First Section. Primarily for Undergraduates.

1. General Psychology. An introductory study of the principal facts and laws of the mental life. First half-year. *Mon., Wed., Fri.*, at 10.00. Professor HOUGH.

2. Logic and Theory of Knowledge. Principles of deductive and inductive inference, followed by a study of the nature and structure of knowledge, its organization, and its relation to language. Second half-year. *Mon., Wed., Fri.*, at 10.00. Professor HOUGH.

(Courses 1 and 2 are intended to satisfy the requirements in Psychology and Logic of Groups I, II, III, IV and VI. They are introductory to the remaining courses in Philosophy and Education, and should be taken in the Sophomore year by students intending to pursue advanced courses or courses in Education.)

3. General Psychology. (Parallel with Course 1.) Designed specially for teachers in service. *Tu., Th.*, at 3.50. Assistant Professor RUEDIGER.

(Normal School graduates and teachers of experience may take Course 3 instead of Courses 1 and 2 in satisfaction of the requirement of Group IV.)

Second Section. For Undergraduates and Graduates.

20. Ethics or the Moral Value of Conduct. A critical review of the chief historical systems of morals, preceded by a psychological analysis of conduct. *Tu., Th.*, at 10.00 (or at afternoon hours to be arranged). Professor HOUGH.

21. History of Philosophy. The evolution of philosophic thought in relation to the progress of civilization and the interpretation of human life. Lectures with collateral reading. *Tu., Th.*, at 4.50. Professor HOUGH.

(Courses 20 and 21 should be preceded by Courses 1 and 2, or 3, or an equivalent.)

23. Experimental Psychology. An introductory laboratory course on sensation, movement, memory, emotional manifestations, etc. This course should be preceded by the course in General Psychology, but it may be taken in connection with the latter with the consent of the instructor. *Wed.*, 3.30-5.30. One hour credit. Professor FRANZ and Laboratory Assistant.

24. Abnormal Psychology. A course in which variations from normal mental processes and their bearing upon problems of normal psychology are discussed. The topics considered are adapted to the needs of the students electing the course. During the year 1908-09 the subject of the

course was feeble-mindedness and delinquency. Lectures, demonstrations, and assigned readings. One two-hour period each week. Professor FRANZ.

(This course will be given at the Government Hospital for the Insane.)

Third Section. Primarily for Graduates.

40. The Principles of Psychology. A seminar course for the advanced study of fundamental problems. Designed for graduates taking a major or minor in Psychology. Open to undergraduates who obtain the permission of the instructor. Hours to be arranged. Credit two hours. Professor HOUGH.

41. Experimental Psychology. A laboratory course, treating special topics in psychology, such as memory, time of mental processes, movement, sensation, emotion, abnormal psychology, and physiological psychology. The topics selected for consideration in any year will be determined by the need of the students electing the course. Open only to students who have taken or are taking the course in general psychology, and the introductory course in experimental psychology, or their equivalents. Hours to be arranged. Professor FRANZ.

42. Experimental Psychology. A research course. Open only to students who have taken Courses 23 and 41, or their equivalents. Students will take up topics for original investigation in some field of experimental, physiological, comparative, or pathological psychology. Hours to be arranged. Professor FRANZ.

(Courses 41 and 42 will be given in the psychological laboratory of the Government Hospital for the Insane, which is specially well equipped for psychological teaching and research.)

43. Elements of Metaphysics. Selected fundamental problems. Designed for graduates taking a major in Philosophy. One hour. Professor HOUGH.

EDUCATION.

Courses 1 and 2 in General Psychology and Logic must precede, or be taken parallel with, the first course in Education; but normal school graduates, and teachers of experience, may satisfy this requirement by taking Course 3 in General Psychology. The work in Education should begin either with the Principles of Education and of Teaching (Courses 21a and 21b), or with the History of Education (Course 22b). Candidates for the Teacher's Diploma are required to complete before graduation Courses 20 or 21 (a and b); 22 (a or b); 23 and 24, or 25; 30 (a and b), and 31. But teachers of experience may substitute an elective in Education, counting 2 units, for Course 31.

Second Section. For Undergraduates and Graduates.

21a. Principles of Education. The bases, aims, values, and essential content of education as revealed by biological, psychological, sociological, and ethical principles. First half-year. *Tu., Th.*, at 4.50. Assistant Professor RUEDIGER.

21b. Educational Psychology or Principles of Teaching. The fundamental principles underlying the teaching process as revealed by psychology and logic. Second half-year. *Tu., Th.*, at 4.50. Assistant Professor RUEDIGER.

(20a and b. The Principles of Education and Teaching, a course parallel with the preceding, will be given in 1911-12. *Mon., Wed., Fri.*, at 9.00. Assistant Professor RUEDIGER.)

22b. History of Education. A general course in the historical development of educational theory and practice. *Sat.*, 10-12. Assistant Professor RUEDIGER.

23. Child Study. The psychology, physiology, and hygiene of childhood and adolescence with special reference to the problems of teaching. Kirkpatrick's *Fundamentals of Child Study*, supplemented by lectures, assigned reading and reports. *Sat.*, 10 to 11. Dr. SMALL.

24. School Sanitation and Hygiene. A survey of the relations of education and health, including: The function of the school in promoting health; physical examination of children; medical inspection; physical education; diseases and defects incident to school life; the organization of instruction as related to fatigue; defective children; schoolhouse construction and sanitation. Lectures, reference work, and reports. *Sat.*, 11 to 12. Dr. SMALL.

25. Secondary Education. A practical course for actual or prospective high school teachers, considering the history and function of American and foreign secondary education, and the values, essential content, and methods of presentation of the high school branches. *Mon., Fri.*, at 3.50. Assistant Professor RUEDIGER.

26. Elementary Education. The application of the principles of education and of teaching to the elementary school, giving special attention to the aims, values, and methods of presentation of the elementary school branches. *Mon., Fri.*, at 3.50. Not given in 1910-11. Assistant Professor RUEDIGER.

(Courses 25 and 26 will be given in alternate years.)

29. Teaching Pupils to Study. A practical course on the development of initiative in thought and study. *Wed.*, at 3.50. Assistant Professor RUEDIGER.

30a. Class Management. A consideration of the practical problems of the class-room, including economy in class management, attendance, discipline, physical conditions, the daily program, and the technique of

class instruction. Class discussions, lectures, and assigned readings. *Wed.*, 4.50. First half-year. Mr. KRAMER.

30b. School Supervision. A course involving the study of the relations of teachers to supervising officers, the principles of helpful criticism, the testing of class work, the conducting of teachers' meetings, and the rating of teachers. Class discussions, lectures, and assigned readings. *Wed.*, 4.50. Second half-year. Mr. KRAMER.

31a. Observation. Both the application of general educational principles and the methods of teaching particular subjects are systematically observed and discussed. First half-year. Two hours. Hours to be arranged. Assistant Professor RUEDIGER.

31b. Practice. The student-teacher is led in particular to form the connection between theory and practice and to establish right teaching habits. Second half-year. Two hours. Hours to be arranged. Assistant Professor RUEDIGER.

(Course 31 is open only to students registered in Teachers College, or to graduates taking a major or minor in Education.)

32. Adolescence. A consideration of the psychology of adolescence with special reference to the problems of secondary education. Lectures, readings, and special topics. One hour. Dr. SMALL.

Third Section. Primarily for Graduates.

40. Research in Educational Psychology. Methods of investigation, followed by a review of typical studies. Each student will be expected to investigate and report upon some special topic. Two hours. Hours to be arranged. Assistant Professor RUEDIGER.

PHYSICS.

HOWARD L. HODGKINS, Ph.D.....	Professor
PERLEY G. NUTTING, Ph.D.....	Assistant Professor
.....	Instructor

First Section. Primarily for Undergraduates.

1. General Physics. A recitation and lecture course, embracing the fundamental principles of mechanics, sound, heat, light, and electricity. The lectures are illustrated by experiments. This is a required course for Sophomores in Engineering, and may be elected by the general student who has had a college course in trigonometry. *Mon., Wed., Fri.*, at 4.50.

2. Laboratory Physics. A selected series of experiments, mainly quantitative. Two two-hour periods. *Tu., Th.*, at 10.

3. Introductory General Physics. A lecture and recitation course, similar to Course 1, but less mathematical, and planned with reference to the needs of the general student. *Mon., Wed., Fri.*, at 1.30.

Second Section. For Undergraduates and Graduates.

21. Heat. A lecture and laboratory course, based on Preston's Theory of Heat and Poynting and Thomson's Heat. Three periods. Not given in 1910-11.

22. Light. A lecture and laboratory course, based on Preston's Theory of Light and Schuster's Theory of Optics. Three periods. Not given in 1910-11.

Third Section. Primarily for Graduates.

45. Spectroscopy. An experimental study of the flame, arc, spark, and vacuum tube spectra of the chemical elements; variations in spectra produced by varying excitation; spectra of mixed gases and alloys; identification of elements; photography of spectra. Assistant Professor NUTTING.

POLITICAL SCIENCE.

ERNEST G. LORENZEN, J.U.D.....Professor of Law
BLAINE F. MOORE, A.B.....Assistant Professor of Political Science
PAUL CHARLTON.....Lecturer
LESLIE C. McNEMAR, A.B.....Instructor

Second Section. For Undergraduates and Graduates.

20. The American Governmental System. An introductory course for the study of federal government in the United States, discussing the fundamental nature of the union and the relation of the national government to the States, the territories, and the outlying possessions. First half-year. *Mon., Wed., Fri.*, 4.50 p. m. Assistant Professor MOORE.

21. Actual American Government. A continuation of the preceding course, with emphasis upon the actual organization and operation of the national government. A study of Congress and the executive departments in action, and of the organization and control of political parties. Second half-year. *Mon., Wed., Fri.*, 4.50 p. m. Assistant Professor MOORE.

23. Municipal Government in the United States. A study of the organization and administration of city government in the United States with some comparative study of European conditions. The growth of cities; development of the legal position of the city; powers and liabilities of municipal corporations; municipal problems, such as those relating to local transportation, police, light and water supply, charities, education, municipal ownership of public utilities. First half-year. *Mon., Wed., Fri.*, 11 a. m. Assistant Professor MOORE.

24. Municipal Government in Europe. The legal position of the European city; its powers and liabilities; governmental organization

and methods of administration; municipal problems in Europe and how they have been met; municipal ownership. Second half-year. *Mon., Wed., Fri.*, 11 a. m. Assistant Professor MOORE.

25. The Elements of Political Science. The origin, nature, and functions of the State; the fundamental political concepts such as the State, sovereignty, government, law, civil liberty; the forms of State; the forms of government; modern political theories. Two hours, first half-year. *Th.*, 4.50 to 6.30 p. m. Assistant Professor MOORE.

26. American Political Theories. A course discussing the development of American political ideas. Political theories of the colonial, the revolutionary, and the formative periods; the growth of democratic ideas; political theories of the slavery and Civil War controversies; modern political theories in America. Second half-year. *Mon., Fr.*, 11 a. m. Mr. McNEMAR.

28. Comparative Constitutional Law. A comparative study of the constitutions and governmental forms of the United States, Great Britain, France, Germany, and Switzerland as representing types of modern constitutional governments; some comparison of these types with constitutional forms in other States. Two hours, second half-year. *Th.*, 4.50 to 6.30. Assistant Professor MOORE.

29. Introduction of the Study of Law. An elementary course of lectures, with collateral reading, intended to assist the student beginning the study of law. It will deal with (1) the nature, scope, classification, and history of the law; (2) how and where to find the law, and (3) courts and procedure. Woodruff's Introduction to the Study of Law. Hours announced on law schedule. Professor LORENZEN.

Third Section. Primarily for Graduates.

40. Administrative Law. A study of the organization of national and State administrative systems and of the law governing official relations. Second half-year. *Mon., Wed.*, 9 a. m. Mr. McNEMAR.

41. Private Rights and Immunities under the Constitution. An advanced course in Constitutional Law—a study of cases showing the development of federal protection of private rights and immunities as against the powers of the States. Remedies against the powers of the States; limitations on the powers of the States to deprive persons of life and liberty, to define and regulate the uses of property, to impose taxes, to impair the obligation of contracts, etc. Two hours, second half-year. *Tu.*, 4.50 to 6.30 p. m. Assistant Professor MOORE.

42a. Colonial Government. A study of the past and present colonial systems of the world; the causes of their formation; the theory of the relationship between States and their colonies; the institutions and methods of the central government for colonial control. First half-year. *Wed., Fri.*, 10 a. m. Mr. McNEMAR.

42b. Colonial Administration. A study of colonial executive organizations and the administration of the laws in colonies; the conduct of finances, commerce, industries, labor, and education in the colonies of the world. The organization and administration of the insular possessions of the United States. Second half-year. *Tu., Th., 9 a. m.* Mr. CHARLTON.

43. Roman Law. A comparison of some of the fundamental conceptions of the law of Rome and of the modern Civil Law with those of the Roman Law. Open only to students who have had instruction in American Law. Two hours, first half-year. Not given in 1910-11. Professor LORENZEN.

45. Spanish-American Law. Giving an outline of the legal systems prevailing in Central and South America, in Cuba, Porto Rico, and the Philippine Islands, with emphasis upon their private laws, both civil and commercial, and their system of procedure. Open only to students who have had instruction in Roman law. Lectures, assigned reading, and reports. Two hours, second half-year. Not given in 1910-11. Professor LORENZEN.

46. Seminar in Political Science. Students competent to undertake advanced work along special lines are admitted to this Seminar for the presentation and discussion of essays on topics belonging to the field of political science proper. Assistant Professor MOORE.

PREVENTIVE MEDICINE.

GEORGE M. STERNBERG, M.D., LL.D.....Professor

Third Section. Primarily for Graduates.

40. Food preservatives in relation to the Public Health. The hygienic results of milk sterilization. The hygienic results of filtration of municipal water supplies. The use of chemical agents for the sterilization of water supplies municipal or domestic. The results of legislative and philanthropic efforts to arrest the progress of tuberculosis in the United States, and especially in the principal cities.

ROMANCE LANGUAGES AND LITERATURES.

GEORGE N. HENNING, A.M.....Professor

FRENCH.

First Section. Primarily for Undergraduates.

1. Grammar, composition, drill in pronunciation. Fraser and Squair's French Grammar. Translation and reading of nineteenth century fiction and history. (400-500 pages.) For beginners. *Mon., Wed., Fri.,* at 11.00. Professor HENNING.

2. Parallel with Course 1. *Tu., Th., Sat.,* at 5.40. Professor HENNING.

4. Translation, reading, grammar, composition. Fraser and Squair's French Grammar, Feuillet, *le Roman d'un jeune homme pauvre*, other texts to be announced. Open to students who have passed in French 1 or 2, or have fulfilled the admission requirements in Elementary French. *Tu., Th., Sat.*, at 4.50. Professor HENNING.

6. General survey of French literature nineteenth to seventeenth centuries. Translation, collateral reading and reports thereon, lectures on literature and the history of the language, composition. Open to students who have passed in Course 4, or have fulfilled the admission requirements in Advanced French. *Mon., Wed., Fri.*, at 2.30. Professor HENNING.

Second Section. For Undergraduates and Graduates.

Courses in this group are open to students who have passed in Course 6, or who otherwise satisfy the instructor of their fitness to take them.

21. Seventeenth century literature; history, philosophy, criticism, memoirs, letters, eloquence, drama, fiction, poetry. Balzac, Descartes, Pascal, La Rochefoucauld, La Bruyère, Boileau, Saint-Simon, Mme. de Sévigné, Bossuet, Corneille, Racine, Molière, Fénelon, Malherbe, La Fontaine, etc. Translation, collateral reading and reports thereon, lectures on literature and history. Thesis. Not given in 1910-11.

23. Eighteenth century literature; history, philosophy, criticism, letters, drama, fiction, poetry. Montesquieu, Diderot, Rousseau, Voltaire, Marivaux, Destouches, Sedaine, Beaumarchais, Bernardin de St. Pierre, André Chénier, etc. Translation, collateral reading and reports thereon, lectures on literature and history. Thesis. Not given in 1910-11.

25. Nineteenth century literature; history, philosophy, criticism, memoirs, travels, fiction, drama, lyric poetry. Thierry, Michelet, Miguet, Thiers, Taine, Sainte-Beuve, Brunetière, France, Lemaitre, Renan, Gautier, Mme. de Staël, Chateaubriand, Hugo, George Sand, Mérimée, Balzac, Flaubert, Daudet, Maupassant, Loti, Musset, Dumas fils, Augier, Maeterlinck, Rostand, Lamartine, Vigny, the Romantic poets, the Parnassians, the Symbolists, etc. Translations, collateral reading and reports thereon, lectures on literature and history. Thesis. *Mon., Wed., Fri.*, 3.30. Professor HENNING.

Third Section. Primarily for Graduates.

43. Old French and philology. Darmesteter's Historical French Grammar. La Chanson de Roland, etc. Professor HENNING.

47. The comedies of Molière. Professor HENNING.

50. The Romantic Movement in France with some reference to the same movement in England and Germany. Professor HENNING.

Other courses may be arranged for competent graduates.

SPANISH.

First Section. Primarily for Undergraduates.

1. Grammar, composition. Hills and Ford's Spanish Grammar. Translations and reading of nineteenth century fiction and drama. Open to first-year students only by permission of the instructor. Students may not elect Spanish and Italian in the same year. *Tu., Th., Sat.*, at 10. Professor HENNING.

ITALIAN.

First Section. Primarily for Undergraduates.

1. Grammar, composition. Grandgent's Italian Grammar, Bowen's Italian Reader. Translation and reading of nineteenth century fiction and drama. Open to first-year students only by permission of the instructor. Open only to students who have had at least one year of French or Latin. Students may not elect Italian and Spanish in the same year. Not given in 1910-11.

FEES.

ARTS AND SCIENCES.

- | | |
|--|-----|
| 1. Matriculation fee (payable once)..... | \$5 |
| 2. Annual library fee..... | 2 |
| 3. Tuition fee per annum for graduate courses leading to the degrees of M.A., M.S., C.E., E.E., M.E., Jur.D., and Ph.D.... | 150 |
| Where candidates for higher degrees exceed the minimum time limit they may be liable for an additional charge of \$40 per annum for each topic pursued by them. | |
| 4. Tuition fee per annum for each hour per week of undergraduate courses leading to the degrees of B.A. and B.S., and for graduate courses leading to the degree of M.Dip..... | 10 |
| 5. Late registration fee in the case of students registering for the first term after October 20, or for the second term after February 20, except for courses which do not begin with the terms | 2 |
| 6. Tuition fee for each year of the regular four-year courses in the College of Engineering..... | 150 |
| 7. Laboratory courses: | |
| Material fees: | |
| Mineralogy | 5 |
| Chemistry 2, 3, and 7; Electrical Engineering; Physics, each | 10 |

Chemistry, 4 (Assaying).....	20
Chemistry, except 2, 3, 4, and 7, each.....	25
Deposits to cover breakage of apparatus issued, the amounts paid in excess of breakage to be returned:	
Chemistry, 2, 3, and 7, each.....	10
Chemistry, except 2, 3, 4, and 7, each.....	25
8. Fee for graduation.....	10
9. Tuition fee for the following special course, not taken by candidates for a degree.....	40
Chemistry, Course 4 (Assaying).	
10. In determining tuition fees, three hours of laboratory work in Chemistry, and two hours of laboratory work in other subjects count as one hour.	
11. Fee for certificate under the seal of the University.....	2

No change will be made in the fees fixed at the time of registration except in the case of a change in or withdrawal from a course of study, and then only upon notice in due form and from the end of the current quarter session, when such change or withdrawal shall be approved. Applications for permission to change a course of studies or for the granting of a withdrawal should be made on the prescribed form to be obtained from the Secretary or the Dean, and will be received only at the end of a quarter session.

PAYMENT OF FEES.

All fees are to be paid to the Treasurer. Tuition fees are payable quarterly in advance. Matriculation, library, and laboratory fees are payable in full in advance. Security for the payment of all fees may be required according to regulations to be adopted by the Board of Trustees.

BOARD AND ROOMS.

A register of approved boarding houses is kept by the Treasurer. Accommodations cost from \$25 to \$40 a month.

HONORABLE DISMISSION.

An honorable dismission will always be issued to any student who has been granted a withdrawal from the University in good standing.

For catalogues, application blanks, and further information, address

THE SECRETARY,
The George Washington University,
Washington, D. C.

Professional Departments.

DEPARTMENT OF LAW.

FACULTY.

CHARLES H. STOCKTON, LL.D.....ACTING PRESIDENT OF THE UNIVERSITY
ERNEST G. LORENZEN, Ph.B., LL.B., J.U.D.....Professor of Law, Dean
MELVILLE CHURCH, LL.M.....Professor of the Law of Patents
WALTER C. CLEPHANE, LL.M.....Professor of Law
EDWIN C. BRANDENBURG, LL.M.....Professor of Law
ARTHUR PETER, LL.M.....Professor of Law
STANTON J. PEELE, LL.D.....Professor of Law
JOHN PAUL EARNEST, A.M., LL.M.....Professor of Law
WENDELL PHILLIPS STAFFORD, LL.D.....Professor of Law
JOSIAH A. VAN ORSDEL, LL.D.....Professor of Law
HARRIES ARTHUR MUMMA, A.B., LL.B.....Assistant Professor of Law
JOHN WILMER LATIMER, LL.B.....Assistant Professor of Law
EVERETT FRASER, A.B., LL.B.....Assistant Professor of Law
ALFRED BUHRMAN.....Clerk of the Moot Court
JOSEPH RYLAND CURL, B.S.....Secretary of the Department of Law

COURT OF APPEALS.

WILLIAM F. MATTINGLY, LL.D.....Chief Justice
JOHN B. LARNER, LL.D.....Associate Justice
STANTON J. PEELE, LL.D.....Associate Justice

GENERAL STATEMENT.

This Department, established in 1865, is the oldest school of law in the city of Washington. Its course of instruction for the degree of Bachelor of Laws, originally requiring but two years, was gradually expanded, until, in 1898, in accordance with the recommendation of the American Bar Association, it was increased to three years. The Faculty has also shown a gradual increase in numbers commensurate with the expansion of the course and the growing number of students in attendance. Beginning with 1903, the Board of Trustees adopted the policy of placing most of the important topics of substantive law under the charge of trained professional teachers giving their whole time to the work of

legal instruction. Those branches of the law connected with practice will continue to be under the charge of professors who are actively engaged in the administration of the law either at the bar, or on the bench.

In 1877 a year of graduate work, leading to the degree of Master of Laws, was added to the course of instruction offered, and in 1905 a special graduate course of three years, leading to the degree of Doctor of Jurisprudence, was established. Work for this degree is now carried on by members of the Law Faculty under the general direction of the University Faculty of Graduate Studies. A special course in Patent Law was added in 1895.

In June, 1898, an ordinance was adopted by the Board of Trustees formally establishing as a separate department of the University the Department of Jurisprudence and Diplomacy. This Department was opened on November 15, 1898.

In 1904, by the authority of the Board of Trustees, a new adjustment of graduate work in the University was made, resulting in the establishment of the Departments of Law and of Politics and Diplomacy (now called the College of the Political Sciences), the former embracing the undergraduate course in municipal law and graduate courses in the broader fields of general law, and the latter graduate and undergraduate courses in the political sciences, special attention being given to diplomacy.

SEPARATE COURSES FOR ALL-DAY AND AFTERNOON STUDENTS.

Since 1903 the work of the Law School has gradually been transferred from the late afternoon hours to the forenoon, and at the present time the lectures offered to all-day students are largely confined to the earlier part of the day.

To meet the needs of those students whose employment in the Government service, or elsewhere, prevents their attendance before 4:30 in the afternoon, an afternoon course is given.

HOURS FOR LECTURES.

In the all-day course a large part of the instruction is given between the hours of 9.00 a. m. and 1.00 p. m.

In the afternoon course the instruction is given between the hours of 4.50 and 6.30 p. m.

LOCATION.

All classes in the Department of Law are held in the Law Building, situated on H street, adjoining the main University building, at the corner of Fifteenth street. This hall, dedicated on January 3, 1899, was

especially designed for the work of this Department. It is commodious and well equipped with lecture-rooms, Moot Court rooms and offices, and contains the law library, with a conference-room adjoining.

ACADEMIC YEAR.

The academic year extends through more than eight months, beginning on the last Wednesday in September and ending on the second Wednesday in June, and is divided into two half-years, the second half-year beginning on the first day of February. The session of 1910-11 begins on Wednesday, September 28, and closes Wednesday, June 7. Since many of the courses given during the first half-year are completed before the beginning of the second half-year, it is possible for a student to enter on the 1st of February of any year and be graduated three years from that date, receiving his degree at the Winter Convocation, held on February 22, of each year.

Lectures begin promptly on the first day of the term, and students applying for admission at a later day will be admitted only upon showing good cause for the delay and by special action of the Faculty.

ADMISSION.

1. FOR THE DEGREE OF BACHELOR OF LAWS.

Applicants for admission as candidates for the degree of Bachelor of Laws must be at least eighteen years of age and must have had educational training sufficient to satisfy the entrance requirements of the Department of Arts and Sciences of the University. In order to satisfy these requirements, which are set out at length in the General Catalogue of the University, students must present credits aggregating 15 units, which are broadly equivalent to a four years' high school course. Applicants for admission on certificate should secure formal certificates setting forth the credits claimed, and present these certificates attached to their application forms. All applications for admission should be addressed to the Secretary of the Department of Law, who will, upon request, furnish proper blanks and detailed information as to entrance examinations.

2. FOR THE DEGREE OF MASTER OF LAWS.

Candidates for the degree of Master of Laws must be at least twenty-one years of age and hold the degree of Bachelor of Laws from an institution substantially complying with the requirements of the Association of American Law Schools, of which this school is a member.

3. FOR THE DEGREE OF MASTER OF PATENT LAW.

Only those students who are graduates of an approved law school or members of the bar in good standing will be admitted as candidates for the degree of Master of Patent Law.

4. FOR THE DEGREE OF DOCTOR OF JURISPRUDENCE.

No student will be admitted as a candidate for the degree of Doctor of Jurisprudence unless he shall hold a baccalaureate degree conferred by some institution of approved standing after the completion of a liberal course of undergraduate academic study, and possess a reading knowledge of Latin, French, and German. At the discretion of the Faculty, however, other languages may be substituted when the character of the work undertaken is such as to warrant it. The right is reserved to the Faculty of Graduate Studies to decide in all cases whether the applicant has given sufficient evidence that his antecedent training fulfills these requirements. In addition, the candidate must hold the degree of Bachelor of Laws from this University or from some other institution requiring equivalent work as a prerequisite to that degree.

5. SPECIAL STUDENTS.

Persons who for any reason do not qualify as candidates for a degree may, on the recommendation of the Faculty and with the assent of the professors whose courses they elect to take, be admitted as special students.

ADVANCED STANDING.

Students may be admitted to advanced standing in the second or third year classes upon satisfying the requirements for the work of the preceding year or years. These requirements may be met by presenting certificates from other law schools of accredited standing showing that the student has successfully completed equivalent courses, or by passing the regular examinations set for that purpose at the beginning of the term, after the student has shown that he has pursued a course of study in the subjects upon which he is examined, covering at least as many hours as are required for such subjects in this University.

All examinations that may be required of applicants for advanced standing are held during the first week of each session.

METHOD OF INSTRUCTION.

Instruction in the class-room is based upon the study and discussion of cases. In some of the courses students are required to read parallel assignments in text-books.

In conducting the discussion of cases in the class-room every effort is made to lead the student to a clear understanding of the fundamental legal principles that may be involved, and to afford him scientific training in accurate methods of study and of reasoning along legal lines.

Subjects involving the adjective law are in charge of professors who are engaged in active practice. The general principles of these subjects,

taught in the same manner as indicated above, are developed by practice before the Moot Courts.

UNDERGRADUATE PROFESSIONAL COURSES.

Undergraduate students in Arts and Sciences upon the completion of forty-five units of credit may take the first year's work of the course for Bachelor of Laws, crediting them fifteen units, on the completion of which they may receive the academic degree.

COURSES OF INSTRUCTION.

A. LEADING TO THE DEGREE OF BACHELOR OF LAWS.

The course of instruction leading to the degree of Bachelor of Laws extends through a period of three years. A minimum of thirty-six hours' work is required of all candidates for this degree.

Students devoting their whole time to the study of law may, with the permission of the Dean, select additional subjects from the second and third years, provided the aggregate of the hours taken does not exceed fifteen a week. Such excess credits may be applied toward the degree of Master of Laws.

FIRST YEAR SUBJECTS.

First Semester.

* Contracts. Assistant Professor MUMMA. Three hours a week. Williston's Cases on Contracts.

* Torts. Professor LORENZEN. Two hours a week. Ames & Smith's Cases on Torts.

* Property I. Assistant Professor FRASER. Two hours a week. Gray's Cases on Property, Volume I.

Criminal Law. Professor EARNEST. Two hours a week. Clark's Criminal Law and Mikell's Cases on Criminal Law.

Agency. Assistant Professor MUMMA. Two hours a week. Wambaugh's Cases on Agency.

Introduction to the Study of Law. Professor LORENZEN. One hour a week. An elementary course of lectures, with collateral reading, intended to assist the student beginning the study of law. It will deal with (1) the nature, scope, classification, and history of the law; (2) how and where to find the law, and (3) courts and procedure. Woodruff's Introduction to the Study of Law.

*The subjects marked with an asterisk are given both in the forenoon and afternoon.

Second Semester.

* Contracts. Assistant Professor MUMMA. Three hours a week. Williston's Cases on Contracts.

* Torts. Professor LORENZEN. Two hours a week. Ames & Smith's Cases on Torts.

* Property I. Assistant Professor FRASER. Two hours a week. Gray's Cases on Property, Volumes I and II.

Criminal Procedure. Professor EARNEST. One hour a week. Clark's Criminal Procedure.

Domestic Relations. Professor LORENZEN. Two hours a week. Woodruff's Cases on Domestic Relations.

Bailments and Carriers. Professor ———. Two hours a week.

Damages. Professor ———. One hour a week. (Not given in 1910-11.)

SECOND YEAR SUBJECTS.

First Semester.

* Property II. Assistant Professor FRASER. Two hours a week. Gray's Cases on Property, Volumes II and III.

* Corporations, Private and Public. Professor LORENZEN. Four hours a week. Smith's Cases on Private Corporations. Smith's Cases on Municipal Corporations.

Common Law Pleading and Practice. Professor CLEPHANE. Two hours a week. Tyler's Stephen on Pleading.

Evidence. Professor PETER. Two hours a week. McKelvey on Evidence and Thayer's Cases on Evidence.

Equity I. Professor STAFFORD. Two hours a week. Ames' Cases on Equity Jurisdiction.

Second Semester.

* Property II. Assistant Professor FRASER. Two hours a week. Gray's Cases on Property, Volumes II and III.

* Quasi-contracts. Assistant Professor FRASER. Two hours a week. Scott's Cases on Quasi-contracts.

* Sales. Assistant Professor MUMMA. Two hours a week. Williston's Cases on Sales.

Evidence. Professor PETER. Two hours a week. McKelvey on Evidence and Thayer's Cases on Evidence.

Equity Pleading and Practice. Professor CLEPHANE. One hour a week. Thompson's Cases on Equity Pleading and Practice.

Equity II. Professor STAFFORD. Two hours a week. Ames' Cases on Equity Jurisdiction.

Partnership. Professor PELLE. One hour a week. Burdick on Partnership and Gilmore's Cases on Partnership.

THIRD YEAR SUBJECTS.

First Semester.

* Property III. Assistant Professor FRASER. Two hours a week. Gray's Cases on Property, Volume V.

* Bills and Notes. Assistant Professor MUMMA. Two hours a week. Huffcut's Negotiable Instruments: Statutes, Cases, and Authorities.

* Corporations, Private and Public. Professor LORENZEN. Four hours a week. Smith's Cases on Private Corporations. Smith's Cases on Municipal Corporations.

* Brief Making. Assistant Professor LATIMER. One hour a week.

* Trusts. Professor ———. Ames' Cases on Trusts. (Not given in 1910-11.)

Equity I. Professor STAFFORD. Two hours a week. Ames' Cases on Equity Jurisdiction.

Moot Court. Professors CLEPHANE, EARNEST, and PETER. Two hours a week.

Organization and Management of Corporations. Professor CLEPHANE. One hour a week. Clephane on the Organization and Management of Corporations.

Bankruptcy. Professor BRANDENBURG. One hour a week. Brandenburg on Bankruptcy.

Federal Procedure. Professor BRANDENBURG. One hour a week.

Water Rights and Irrigation. Professor VAN ORSDEL. One hour a week. Long on Irrigation and assigned cases.

Admiralty. Professor ———. One hour a week. (Not given in 1910-11.)

Constitutional Law. Professor ———. Two hours a week. (Not given in 1910-11.) McClain's Cases on Constitutional Law.

Second Semester.

* Conflict of Laws. Professor LORENZEN. Four hours a week. Lorenzen's Cases on Conflict of Laws.

* Quasi-contracts. Assistant Professor FRASER. Two hours a week. Scott's Cases on Quasi-contracts.

* Sales. Assistant Professor MUMMA. Two hours a week. Williston's Cases on Sales.

* Preparation of Legal Instruments. Assistant Professor LATIMER. One hour a week.

* Mortgages. Professor ———. Two hours a week. Wyman's Cases on Mortgages. (Not given in 1910-11.)

* Insurance. Assistant Professor MUMMA. Two hours a week. Wambaugh's Cases on Insurance. (Not given in 1910-11.)

Suretyship. Assistant Professor MUMMA. Two hours a week. Ames' Cases on Suretyship.

Equity II. Professor STAFFORD. Two hours a week. Ames' Cases on Equity Jurisdiction.

Moot Court. Professors CLEPHANE, EARNEST, and PETER. Two hours a week.

Wills and Administration. Professor PETER. One hour a week.

Legal Tactics and Ethics. Professor CLEPHANE. One hour a week.

Extraordinary Legal Remedies. Professor ———. One hour a week.

B. LEADING TO THE DEGREE OF MASTER OF LAWS.

Students admitted as candidates for the degree of Master of Laws are required to elect subjects, not previously taken, covering a minimum of ten hours a week. These may be freely elected from the subjects offered by the Faculty of Law and from the following subjects given in the College of the Political Sciences:

International Law.

Comparative Constitutional Law.

Administrative Law.

Private Rights and Immunities under the Constitution.

Taxation.

Any excess credits obtained in this Law School in the course leading to the degree of Bachelor of Laws may be applied toward the Master's degree. The degree of Master of Laws will not be conferred, however, until one year after the receipt of the Bachelor's degree.

Advanced Practice.—Candidates for the Master's degree may also elect advanced practice work in the Moot Court, receiving therefor a credit of two hours for the year.

C. LEADING TO THE DEGREE OF MASTER OF PATENT LAW.

A special course in Patent Law and Patent Law Practice is given by Professor Church. The purpose of this course is to prepare those taking it for practice in all matters involving the law of patents. The course extends throughout one year, with two lectures or sessions of the Moot Court each week. (For the admission requirements for this course, see page 5.)

D. LEADING TO THE DEGREE OF DOCTOR OF JURISPRUDENCE.

The work for this degree is similar in character, method, and scope to that required for the degree of Doctor of Philosophy, and is under the

control of the University Faculty of Graduate Studies. See the General Catalogue of the University.

COURSES IN PRACTICE.

A. MOOT COURT WORK.

1. *Third Year:*

Particular stress is laid upon Moot Court work. Aside from the practice court connected with the course in Patent Law, there are four courts in which undergraduate students pursue their work. Three of these are *nisi prius* courts and are presided over by members of the Washington Bar in active practice. The fourth is a Court of Appeals to review the cases tried in the courts of first instance. This court is composed of the Chief Justice of the United States Court of Claims and of members of the Washington Bar.

Every third-year student before receiving the Bachelor's degree is required to prepare the pleadings in and prosecute to judgment the required number of cases in the *nisi prius* courts, with the privilege of appeal to the appellate tribunal. At least two hours in each week during the year must be spent by each third-year student in active participation in Moot Court work in the court-room to which he is assigned.

Statements of facts are furnished, such as would be related to a lawyer in active practice by his client. Each student must determine whether or not upon such facts the particular case in hand is one of common law or equitable cognizance. He must then frame his pleadings, serve his writs, and answer his adversary's pleadings until issue is joined in legal manner, after which the case is brought on for hearing in strict accordance with the rules of actual practice. Juries are empaneled in accordance with settled legal procedure, witnesses are examined and cross-examined, and the case conducted through all the various stages of the trial or hearing down to and including the judgment or decree, after which, should the case be appealed, it must be carried through the appellate court, involving the preparation of the record on appeal, briefs of counsel, etc.

2. *Fourth Year:*

The same facilities for Moot Court work as are described above are afforded in the course leading to the degree of Master of Laws. In this course, however, the nature of the cases assigned is somewhat different, involving, in addition to the ordinary cases at common law or in equity, cases of a special character, such as habeas corpus, certiorari, quo warranto, injunction, mandamus, extradition, replevin, attachment, etc.

3. *Officers and Equipment:*

The clerk of the Moot Court is one of the assistant clerks of the Supreme Court of the District of Columbia, but his assistants in each court-room are chosen from the student body, from whose ranks are also drawn the criers, jurors, and other officials, thus giving to the students the benefit of practice in administrative judicial machinery. The Moot Court is to all intents and purposes an actual court. The rooms in which the sessions are held are fitted up with judges' benches, clerks' desks, jury-boxes, and counsel table, and from the time the crier announces that the court is in session until he announces its adjournment the procedure is identical with that of a regular judicial tribunal.

It is believed that any student who gives the proper attention to this feature of the law curriculum will be enabled to go out from this institution and creditably try cases in court, although he may never have been in an actual court-room.

A careful record is kept of the work of each student, both as to his pleadings and his conduct of the case in court, and the ratings thus given determine, in connection with his ratings upon other subjects, whether or not he is entitled to a degree.

B. BRIEF MAKING.

In view of the rapidly increasing bulk of our case law, it becomes absolutely indispensable that students should be taught to find authorities in point, to collate them, and to present them to the court in a clear and concise form. In order to afford this training a course in Brief Making is given. This course will be conducted in part in the Library of the Department of Law, so that the use of the digests and reports may be illustrated.

C. PREPARATION OF LEGAL INSTRUMENTS.

Students are instructed in this course in the actual preparation of deeds, mortgages, wills, assignments, contracts, partnership agreements, and other legal instruments which a lawyer is called upon to prepare. Statements of facts are furnished to the class by the professor in charge, and each student is required to prepare the various forms of instruments. These are corrected by the professor and are discussed and criticised in class. Careful consideration is given to special forms of execution and acknowledgment when one of the parties to the instrument is a corporation, a partnership, a married woman, and the like.

D. LEGAL TACTICS AND ETHICS.

Every young lawyer entering upon his professional career is desirous of availing himself of the experience of an older practitioner and of

learning many things which are not taught and cannot be taught from books. It is to meet the needs of this class of men that this course is given. It is in charge of a member of the Washington Bar whose practice has been an active one, extending over a period of many years.

A short introductory talk is given upon the relations between attorney and client, including the important subject of fees, after which the student is given the benefit of practical hints upon the manner of starting in practice and opening and furnishing an office, with suggestions as to office systems. Advice is given as to selecting a law library, the best way to find authorities in point, and how such authorities should be used in court.

The student is told how to listen intelligently to his client's grievances; how to draw up the pleadings arising out of these grievances; how to prepare for trial the case thus made, including the work of preparing the evidence; how to try the case and examine and cross-examine witnesses; the manner of making up the record, and conducting the argument on appeal. The Canons of Professional Ethics adopted by the American Bar Association are studied in this course. At various times during the year distinguished lawyers are invited to appear and discuss informally special topics of interest to the students.

EXAMINATIONS AND GRADES.

A. UNDERGRADUATE COURSES.

Regular Examinations:

Written examinations are held at the close of each semester. All students, unless specially excused by the Dean, are required to take the first examination held after the completion of any subject.

No student, except by special permission of the Dean, will be allowed to take an examination in any subject unless he shall be regularly registered and have been in regular attendance upon the lectures and have done all the work required in the course of instruction upon that subject.

Grades:

At all examinations the grading of students will be indicated by the letters A, B, C, D, E, and F, representing, respectively, *excellent*, *good*, *satisfactory*, *fair*, *conditioned*, and *failed*.

Conditions:

A student receiving the grade of E (*conditioned*), in the regular examination in any course, will be given an opportunity to remove the condition by passing a subsequent examination with the grade of C or better.

The regular examinations for the removal of conditions will be held during the first week of each session. Applications for permission to take any of these examinations must be made to the Secretary of the Department of Law, in writing, not later than three days before the date for which such examination is scheduled. Candidates for the Bachelor's degree may, by action of the Faculty, be granted special examinations in not more than two subjects carried as conditions during the first semester of their last year, at the end of that semester, and in one subject carried as a condition during the second semester, at the end of that year.

A student receiving the grade of F (*failed*), in any examination, or the grade of D or E in any examination to pass off a condition in any course, will be required to take the course over again before being permitted to take another examination in such course.

Class Standing:

Students having conditions in more than two subjects will not be advanced from one class to another, nor will candidates for a degree be permitted to carry more than one condition into the second semester of the year in which they expect to be graduated. Students may have, however (subject to the provisions above enumerated), an opportunity to remove conditions, imposed during any session, by taking the regular examination for the removal of conditions at the beginning of the following session, for which no fee is charged.

Students having conditions in more than three subjects will not be allowed to register except upon special permission from the Dean.

Special Examinations:

No special examinations, other than those above provided for, will be granted to any students except those of the graduating class who, for good cause, shall have been excused by the Dean from taking any regular examination during the third year.

Attendance:

Regular attendance is required in all courses; and the examination grade of any student in any course may be withheld and the passing of another examination or the repetition of the course may be required on the sole ground of unsatisfactory attendance.

Election of Courses:

No student shall be allowed to register in courses aggregating more than fifteen hours during any one semester without first obtaining the permission of the Faculty.

Every student who is a candidate for graduation with the degree of Bachelor of Laws in his third year shall take and pass in each semester of his third year courses aggregating ten hours.

Election of courses to be taken must be made in all cases within ten days after the beginning of the semester in which such courses are given.

B. GRADUATE COURSES.

Examinations in graduate courses will be given at such times and under such conditions as may be designated by the professors in charge.

DEGREES.

1. BACHELOR OF LAWS.

The degree of Bachelor of Laws will be conferred upon students who shall have passed satisfactory examinations upon subjects aggregating thirty-six hours and whose attendance and conduct have been satisfactory to the Faculty. The degree will not be conferred upon students deficient in Bills and Notes, Common Law Pleading and Practice, Contracts, Corporations, Equity, Equity Pleading and Practice, Evidence, Moot Court, Property, and Torts.

The degree of Bachelor of Laws *with distinction* will be awarded to students whose average percentage in all subjects is equivalent to the grade of A.

2. MASTER OF LAWS.

The degree of Master of Laws will be conferred upon students who have completed the work prescribed for this degree with the grade of C or better and whose attendance and conduct have been satisfactory to the Faculty.

3. MASTER OF PATENT LAW.

The degree of Master of Patent Law will be conferred upon students who shall have successfully completed the work of the Patent Law course and whose attendance and conduct have been satisfactory to the Faculty.

4. DOCTOR OF JURISPRUDENCE.

The degree of Doctor of Jurisprudence is given for graduate work in the science of the law upon the same terms and conditions as the degree of Doctor of Philosophy in the Department of Arts and Sciences. See the General Catalogue.

LAW LIBRARY AND READING-ROOM.

A well-equipped working library, comprising about 5,300 volumes, is open to the students in the Law Building from 9.00 a. m. to 10.00 p. m. Competent librarians are in charge and will give students assistance in looking up subjects and in the use of books.

The Library contains the standard text-books, the West Reporter system of Federal and State Decisions complete, State Reports, the English Common Law and Chancery Reports, Encyclopædias of Law, Digests, reference books, and current law publications.

Adjoining the Library is a conversation-room for students, affording opportunity for consultation.

In addition to these facilities, the students have free access to the Congressional Library and other public libraries.

PRIZES.

The Ordronaux Prize Scholarship.—In accordance with the action taken by the Board of Trustees there shall be substituted for the University Prizes of \$40, \$30, and \$20 in cash heretofore offered a prize scholarship, to be known as "The Ordronaux Prize Scholarship," to be awarded to that member of the Second Year Class taking the regular course, whether forenoon or afternoon, who shall during his first and second years have attained the highest average grade. In determining the average grade of contestants the grade received in each subject shall be multiplied by the number of hours given to such subject and the sum of the results divided by the total number of hours. The recipient of this prize scholarship shall be entitled to receive credit for all tuition fees in his third year. Library and diploma fees will remain payable. The award of this scholarship is purely personal and will not be commuted to a cash payment, nor will it be transferable. The recipient of the scholarship shall be entitled to make use of the scholarship during the session next succeeding its award or during any session thereafter.

Edward Thompson Company Prize.—A prize offered by the Edward Thompson Company of a set of the Encyclopædia of Law, first or second edition, or a set of the Encyclopædia of Pleading and Practice, is awarded each year to the senior law student who shall write the best essay on some legal subject to be assigned by the Faculty. This prize will not be awarded, however, if the essays submitted do not possess sufficient merit.

Ellsworth Prize.—A prize of \$25 in gold, offered by Mr. Fritz von Briesen, called the "Ellsworth Prize," is awarded for the best work done in the Patent Law Course by a student receiving the degree of Master of Patent Laws.

PUBLIC SPEAKING.

Excellent facilities for training in the art of public speaking are afforded by the two debating societies that have been organized in the Department of Law. These societies, known as the Columbian and

Needham Debating Societies, meet weekly for debate. Membership in these societies is entirely optional, but their work is encouraged in every legitimate way by the Faculty, and students are urgently advised to take part in their exercises. During each academic year several intercollegiate debates are held. Membership upon the intercollegiate debating teams is an honor eagerly sought and made the prize to be won in separate preliminary contests. The general conduct of these intercollegiate debates is under the supervision of a committee from the Faculty.

ADMISSION TO THE BAR OF THE DISTRICT OF COLUMBIA.

By the rules of the Supreme Court of the District of Columbia, applicants for admission to the Bar are required to have studied law for three years under the direction of a competent attorney, but by those rules the course in the Department of Law of the University is regarded as discharging this requirement.

FEES.

1. Matriculation fee (payable once).....	\$5
2. Annual library fee.....	3
3. Tuition fee per annum for each hour taken per week.....	10
4. Late registration fee in the case of students registering for the first term after October 20, or for the second term after February 20, excepting for courses which do not begin with the terms.....	2
5. Fee for graduation.....	10
6. Tuition fee for course in Patent Law.....	40
7. Fee for a certificate under the seal of the University.....	2

No change will be made in the fees fixed at the time of registration except in case of withdrawal, and then only upon notice in due form, and from the end of the current quarter session when such withdrawal shall be approved. Applications for the granting of a withdrawal should be made on the prescribed form to be obtained from the Secretary of the Department of Law and will only be received at the end of a quarter session.

The library fee will not be charged for the first half-year during which a course is completed in the case of students who enter at the beginning of the second half-year and pay the library fee for that year.

PAYMENT OF FEES.

All fees are to be paid to the Treasurer. Tuition fees are payable quarterly in advance. Matriculation and library fees are payable in full in advance.

BOARD AND ROOMS.

A register of approved boarding houses is kept by the Treasurer.
Accommodations cost from \$20 to \$40 a month.

For catalogues, application blanks, and further information, address

THE SECRETARY OF THE DEPARTMENT OF LAW,
The George Washington University,
Washington, D. C.

DEPARTMENT OF MEDICINE.

FACULTY.

The names are arranged in the several groups in the order of assignment.

ACTING PRESIDENT OF THE UNIVERSITY.

CHARLES HERBERT STOCKTON, LL.D.

J. FORD THOMPSON, M.D.,
Professor of Surgery, Emeritus.

PROFESSORS.

A. F. A. KING, A.M., M.D., LL.D.,
Professor of Obstetrics and Dean Emeritus of the Faculty.
Consulting Physician, Children's Hospital; Obstetrician-in-Chief to The George Washington University Hospital and Dispensary.
1315 Massachusetts Ave. N. W.

GEORGE NICHOLAS ACKER, A.M., M.D.,
Professor of Pediatrics and Clinical Professor of Medicine.
Physician to the Children's Hospital; Consulting Physician to the Episcopal Eye, Ear and Throat Hospital, to the Lutheran Infirmary, to the Casualty Hospital, and to the Eastern Dispensary; Pediatrician-in-Chief to the George Washington University Hospital and Dispensary.
913 16th St. N. W.

HENRY CRÈCY YARROW, M.D.,
Professor of Dermatology.
Consulting Physician to the Garfield Memorial Hospital and to the Children's Hospital; Visiting Physician to the Woman's Clinic; Dermatologist-in-Chief to The George Washington University Hospital and Dispensary.
814 17th St. N. W.

D. KERFOOT SHUTE, A.M., M.D.,
Professor of Anatomy, Emeritus, and Clinical Professor of Ophthalmology.
Consulting Ophthalmologist, Government Hospital for the Insane; Ophthalmologist to Providence Hospital, Central Dispensary and Emergency Hospital, Columbia Hospital, and to the Washington Hospital for Foundlings; Ophthalmologist to The George Washington University Hospital.
1719 De Sales St.

STERLING RUFFIN, M.D.,

Professor of Medicine.

Visiting Physician to the Columbia Hospital for Women; Consulting Physician to the Central Dispensary and Emergency Hospital and to the Government Hospital for the Insane; *Physician-in-Chief to The George Washington University Hospital and Dispensary.*

1335 Connecticut Ave.

WILLIAM K. BUTLER, A.M., M.D.,

Professor of Ophthalmology.

Ophthalmologist to the Garfield Memorial Hospital; Surgeon-in-Charge, Lutheran Eye, Ear and Throat Infirmary; *Ophthalmologist to The George Washington University Hospital.*

1207 M St., N. W.

CHARLES E. MUNROE, S.B., PH.D.,

Professor of Chemistry.

President American Chemical Society, 1898; President Washington Chemical Society, 1895; Vice-President of the American Association for the Advancement of Science, 1888; Fellow of the Chemical Society of London and of the Chemical Gesellschaft, Berlin; etc., etc.

2115 S St., N. W.

CHARLES WILLIAMSON RICHARDSON, M.D.,

Professor of Laryngology, Rhinology, and Otology.

Laryngologist to Providence Hospital, to the Episcopal Eye, Ear and Throat Hospital, and to the Washington Hospital for Foundlings; *Laryngologist-in-Chief to The George Washington University Hospital.*

1317 Connecticut Ave.

J. WESLEY BOVÉE, M.D.,

Professor of Gynecology.

Gynecologist to the Columbia Hospital for Women; Gynecological Surgeon, St. Elizabeth's Hospital for the Insane; *Gynecologist-in-Chief to The George Washington University Hospital and Dispensary.*

The Rochambeau.

A. R. SHANDS, M.D.,

Professor of Orthopedic Surgery.

Orthopedic Surgeon to the Central Dispensary and Emergency Hospital; *Orthopedic Surgeon to The George Washington University Hospital and Dispensary.*

901 16th St., N. W.

FRANCIS R. HAGNER, M.D.,

Professor of Genito-Urinary Surgery and Venereal Diseases.

Genito-Urinary Surgeon to the Garfield Memorial Hospital; *Chief of the Genito-Urinary Clinic, The George Washington University Hospital and Dispensary.*

1725 N St., N. W.

WILLIAM C. WOODWARD, LL.M., M.D.,

Professor of Medical Jurisprudence.

Health Officer, District of Columbia.

1766 Lanier Place, N. W.

WILLIAM A. WHITE, M.D.,

Professor of Psychiatry and Clinical Professor of Neurology.

Superintendent of the Government Hospital for the Insane, District of Columbia;
Lecturer on Insanity, U. S. Army Medical School and U. S. Navy Medical School.

Government Hospital for the Insane.

I. W. BLACKBURN, M.D.,

Professor of Morbid Anatomy.

Pathologist to the Government Hospital for the Insane, District of Columbia.

Government Hospital for the Insane.

SHEPHERD IVORY FRANZ, A.B., PH. D.,

Professor of Physiology.

Psychologist to the Government Hospital for the Insane; Research Assistant, Carnegie Institute, Washington, D. C.

Government Hospital for the Insane.

WILLIAM CLINE BORDEN, M.D.,

Professor of Surgery and Dean.

Lieut.-Colonel, Medical Corps, United States Army, Retired; *Surgeon-in-Chief to The George Washington University Hospital and Dispensary.*

1801 California St., N. W.

D. W. PRENTISS, M.D.,

Professor of Hygiene.

1315 M St., N. W.

HURON W. LAWSON, M.S., M.D.,

Professor of Histology and Embryology and Associate in Surgery.

Visiting Obstetrician to Freedmen's Hospital.

1117 Vermont Ave., N. W.

FREDERICK FULLER RUSSELL, M.D.

Professor of Pathology and Bacteriology.

Major, Medical Corps, U. S. Army; Curator, Army Medical Museum; Instructor in Pathology and Bacteriology, Army Medical School; *Pathologist to The George Washington University Hospital and Dispensary and to the Columbia Hospital.*

1928 Biltmore Street N. W.

W. O. OWEN, M.D.,

Professor of Anatomy.

Major, Medical Corps, United States Army, Retired; Chairman Executive Committee of the Board of Trustees, Garfield Memorial Hospital.

2123 18th St., N. W.

B. M. RANDOLPH, M.D.,

Professor of Materia Medica and Therapeutics.

Attending Physician to Garfield Memorial Hospital Dispensary; Associate Physician to The George Washington University Hospital, Attending Physician to The George Washington University Dispensary.

2010 R St., N. W.

CHARLES S. BUTLER, M.D.,

Professor of Tropical Diseases.

Surgeon, U. S. Navy; Instructor in Naval and Tropical Medicine, U. S. Naval Medical School.

1333 Harvard Street, N. W.

JAMES DUDLEY MORGAN, A.B., M.D.

Associate Professor of Medicine and Clinical Professor of Medicine.

Physician-in-Chief to the Emergency Hospital and Central Dispensary; Visiting Physician to the Garfield Memorial Hospital; Consulting Physician to the Government Hospital for the Insane.

919 15th St., N. W.

NOBLE P. BARNES, M.D.,

Associate Professor of Materia Medica and Therapeutics and Clinical Associate in Medicine.

Pediatrician to the Freedmen's Hospital and to the Eastern Dispensary and Casualty Hospital.

212 Maryland Ave., N. E.

CHARLES FRANKLIN CRAIG, M.D.,

Associate Professor of Pathology and Bacteriology.

Captain, Medical Corps, U. S. Army; Assistant Curator, Army Medical Museum; Instructor in Pathology and Bacteriology, Army Medical School.

1930 Biltmore St., N. W.

CLINICAL PROFESSORS.

THOMAS A. CLAYTOR, M.D.,

Clinical Professor of Medicine.

Visiting Physician to the Garfield Memorial Hospital and to the Tuberculosis Hospital of the District of Columbia.

1315 New Hampshire Ave.

RANDOLPH BRYAN CARMICHAEL, M.D.,

Clinical Professor of Dermatology.

Dermatologist to the Garfield Memorial Hospital, the Providence Hospital, the Washington Hospital for Foundlings, the Central Dispensary and Emergency Hospital; Associate in Dermatology to The George Washington University Hospital and Dispensary.

818 17th St., N. W.

ALBERT L. STAVELY, M.D.,

Clinical Professor of Gynecology.

Gynecologist to the Garfield Memorial Hospital.

1744 M St., N. W.

ARTHUR A. SNYDER, M.D.,

Clinical Professor of Surgery.

Attending Surgeon to the Garfield Memorial Hospital and to the Women's Clinic.
3051 N St., N. W.

JOHN R. WELLINGTON, M.D.,

Clinical Professor of Surgery.

Visiting Surgeon to the Garfield Memorial Hospital, to the Casualty Hospital and to the Children's Hospital; *Associate in Surgery to The George Washington University Hospital.*

1723 Connecticut Ave., N. W.

LUTHER H. REICHELDERFER, M.D.,

Clinical Professor of Surgery.

Attending Surgeon to the Garfield Memorial Hospital, and to the Hospital for Tuberculosis, District of Columbia.

1721 Connecticut Ave., N. W.

ASSOCIATES.

JOHN B. NICHOLS, M.D.,

Associate in Medicine.

Pathologist to the Garfield Memorial Hospital and to the Episcopal Eye, Ear and Throat Hospital.

1321 Rhode Island Ave.

EDWARD E. MORSE, L.M., M.D.,

Associate in Obstetrics.

Obstetrician to the Providence Hospital and to the Freedmen's Hospital; *Associate in Obstetrics to The George Washington University Hospital and Dispensary.*

1527 I St., N. W.

EDWARD G. SEIBERT, M.D.,

Associate in Chemistry and in Laryngology and Ophthalmology

Assistant Surgeon to the Lutheran Infirmary; *Associate in Laryngology and Ophthalmology to The George Washington University Hospital; Laryngologist and Ophthalmologist to The George Washington University Dispensary.*

916 14th St., N. W.

JULIAN M. CABELL, M.D.,

Associate in Obstetrics.

Associate in Obstetrics to Columbia Hospital for Women; *Associate in Obstetrics to The George Washington University Hospital and Dispensary.*

The Rochambeau.

CHARLES STANLEY WHITE, M.D.,

Associate in Surgery.

Associate in Surgery to the Central Dispensary and Emergency Hospital; *Associate in Surgery to The George Washington University Hospital.*

The Farragut.

H. H. DONNALLY, A.M., M.D.,

*Associate in Medicine.*Attending Physician to the Home for Incurables; *Associate in Medicine to The George Washington University Hospital.*

1018 14th St., N. W.

FRANK FREMONT-SMITH, M.D.,

*Associate in Pediatrics.*Attending Physician to the Washington Hospital for Foundlings and to the Children's Hospital; Consulting Physician to the Garfield Memorial Hospital; *Associate in Pediatrics to The George Washington University Hospital and Dispensary.*

1731 H St., N. W.

WM. F. M. SOWERS, A.B., M.D.,

*Associate in Surgery.*Associate Surgeon to the Providence Hospital; Visiting Surgeon to the Washington Hospital for Foundlings and to the Freedmen's Hospital; *Associate in Surgery to The George Washington University Hospital.*

1707 Massachusetts Ave.

G. BROWN MILLER, B.S., M.D.,

*Associate in Gynecology.*Attending Gynecologist to the Central Dispensary and Emergency Hospital; Associate Gynecologist to the Columbia Hospital for Women; *Associate in Gynecology to The George Washington University Hospital.*

1730 K St., N. W.

HENRY R. ELLIOTT, M.D.,

*Associate in Physiology and Pharmacology.*Physician to the Central Dispensary and Emergency Hospital; *Assistant in Genito-Urinary Surgery to The George Washington University Hospital and Dispensary.*
The Maury.

J. L. RIGGLES, M.D.,

*Associate in Anatomy and Gynecology.*Assistant Obstetrician to the Columbia Hospital for Women; *Attending Gynecologist to The George Washington University Dispensary.*

1224 K St., N. W.

HENRY J. NICHOLS, M.D.,

Associate in Bacteriology and Pathology.

Captain, Medical Corps, U. S. Army; Instructor in Pathology and Bacteriology, Army Medical School.

Army and Navy Club.

WILBUR R. BRANDENBURG, M.D.,

Associate in Bacteriology and Pathology.

2335 18th St., N. W.

JOHN SWEYN NEATE, M.D.,

Associate in Pathology and Bacteriology.

Microscopist, Army Medical Museum; *Assistant Pathologist to The George Washington University Hospital* and to the Columbia Hospital.

1509 28th St., N. W.

W. W. WILKINSON, M.D.,

Associate in Medicine.

Assistant Pathologist to the Garfield Memorial Hospital.

The Rochambeau.

CLINICAL ASSOCIATES.

EDGAR P. COPELAND, M.D.,

Clinical Associate in Pediatrics.

Member of the Dispensary Staff of the Children's Hospital and of the Board of Medical Examiners of the District of Columbia; *Associate in Pediatrics to The George Washington University Hospital and Dispensary.*

The Rockingham.

JOHN T. KELLY M.D.,

Clinical Associate in Obstetrics.

Gynecologist to Providence Hospital; Obstetrician-in-Chief to the Columbia Hospital for Women.

1312 15th St., N. W.

W. ASHBY FRANKLAND, M.D.,

Clinical Associate in Medicine.

Gynecologist to the Casualty Hospital and Eastern Dispensary; *Attending Physician to The George Washington University Dispensary.*

1300 Massachusetts Ave., N. W.

INSTRUCTORS.

S. H. GREENE, JR., M.D.

Instructor in Anatomy.

Assistant Surgeon to the Episcopal Eye, Ear, Nose and Throat Hospital.

The Burlington.

HOMER S. MEDFORD, M.D.,

Instructor in Obstetrics.

Assistant in Out-door Maternity Service, Eastern Dispensary and Casualty Hospital.

151 C St., N. E.

T. M. PRICE, PH.D.,

Instructor in Biochemistry.

The Iowa.

O. D. SWETT, M.S.,

Instructor in Chemistry.

Chevy Chase, Md

WALTER H. MERRILL, M.D.,

Instructor in Electro-Therapeutics.

Radiographer to the Garfield Memorial Hospital; Radiographer to The George Washington University Hospital and Dispensary.

1913 14th St., N. W.

O. A. M. McKIMMIE, M.D.,

Instructor in Laryngology and Otology.

Associate Physician to the Episcopal Eye, Ear and Throat Hospital.

1317 Rhode Island Ave., N. W.

H. S. DYE, M.D.,

Instructor in Laryngology and Otology.

Assistant in Laryngology to the Central Dispensary and Emergency Hospital.

1406 L St., N. W.

TRUMAN ABBE, M.D.,

Instructor in Surgery.

Anaesthetist to the Columbia Hospital for Women; Surgeon to the Garfield Memorial Hospital Dispensary.

1819 M St., N. W.

J. LAWN THOMPSON, M.D.,

Instructor in Surgery.

Attending Surgeon to The George Washington University Dispensary.

805 12th St., N. W.

CHARLES W. HYDE, M.D.,

Instructor in Medicine.

Anaesthetist to The George Washington University Hospital.

The Plymouth.

ARTHUR L. HUNT, M.D.,

Instructor in Minor Surgery.

Anaesthetist to The George Washington University Hospital; Attending Surgeon to The George Washington University Dispensary.

The Burlington.

E. T. M. FRANKLIN, M.D.,

Instructor in Surgery.

Attending Surgeon to The George Washington University Dispensary.

1315 19th St., N. W.

W. J. FRENCH, M.D.,

Instructor in Pediatrics.

Assistant Pediatrician to the Central Dispensary and Emergency Hospital.

1736 18th St., N. W.

E. P. MAGRUDER, M.D.,

Instructor in Anatomy.

Superintendent of the Central Dispensary and Emergency Hospital.

The Ashley.

DANIEL T. BIRTWELL, M.D.,

Instructor in Anatomy.

Assistant, Surgical Service, Central Dispensary and Emergency Hospital.

2719 14th St. N. W.

ADAM KEMBLE, M.D.,

Instructor in Gynecology.

Attending Gynecologist to The George Washington University Dispensary.

The Cecil.

VERGIL B. JACKSON, M.D.,

Instructor in Gynecology.

Assistant Surgeon to the Central Dispensary and Emergency Hospital; Attending Gynecologist to The George Washington University Dispensary.

The Brunswick.

SOTHORON KEY, M.D.,

Instructor in Medicine.

1716 H St., N. W.

H. G. FULLER, M.D.,

Instructor in Genito-Urinary Surgery and Venereal Diseases.

Assistant, Genito-Urinary Service, The George Washington University Hospital and Dispensary.

1615 Florida Ave., N. W.

CLARA SOUTHMAYD LUDLOW, Ph.D.,

Instructor in Histology and Embryology.

The Ethelhurst.

CLINE CHIPMAN, M.D.,

Instructor in Minor Surgery.

Anaesthetist to The George Washington University Hospital.

629 G St., S. W.

T. FRANCIS SMITH, M.D.,

Instructor in Medicine.

Attending Physician to The George Washington University Dispensary.

416 2d St., N. W.

GEORGE H. SCHWINN, M.D.,

Instructor in Psychiatry and Neurology.

Physician to the Government Hospital for the Insane.

Government Hospital for Insane.

HARRY W. MILLER, M.D.,

Instructor in Psychiatry and Neurology.

Physician to the Government Hospital for the Insane.

Government Hospital for Insane.

B. R. LOGIE, M.D.,

Instructor in Neurology.

Director of The George Washington University Dispensary.

1792 Columbia Road, N. W.

JOHN P. FILLEBROWN, M.D.,

Instructor in Physiology.

Associate Genito-Urinary Surgeon to The George Washington University Dispensary; Surgeon to the Garfield Memorial Hospital Dispensary.

Stoneleigh Court.

HENRY I. STOUT, M.D.,

Instructor in Anatomy.

1416 I St., N. W.

THE STAFF OF THE GEORGE WASHINGTON UNIVERSITY HOSPITAL AND DISPENSARY.

HOSPITAL.

STERLING RUFFIN, M.D.	Physician-in-Chief
GEORGE N. ACKER, M.D.,	} Associate Physicians
H. H. DONNALLY, M.D.	
B. M. RANDOLPH, M.D.	
W. C. BORDEN, M.D.	Surgeon-in-Chief
C. S. WHITE, M.D.,	} Associate Surgeons
JOHN R. WELLINGTON, M.D.,	
W. F. M. SOWERS, M.D.,	
CHARLES W. HYDE, M.D.,	} Assistants in Surgery
ARTHUR L. HUNT, M.D.,	
CLINE CHIPMAN, M.D.,	
A. R. SHANDS, M.D.	Orthopedic Surgeon
FRANCIS R. HAGNER, M.D.	Genito-Urinary Surgeon
HENRY R. ELLIOTT, M.D.,	} Associate Genito-Urinary Surgeons
HOMER G. FULLER, M.D.,	
J. WESLEY BOVÉE, M.D.	Gynecologist-in-Chief
G. BROWN MILLER, M.D.	Associate Gynecologist
A. F. A. KING, M.D.	Obstetrician-in-Chief
E. E. MORSE, M.D.,	} Associate Obstetricians
J. M. CABELL, M.D.,	
GEORGE N. ACKER, M.D.	Pediatrician-in-Chief
FRANK FREMONT-SMITH, M.D.,	} Associate Pediatricians
E. P. COPELAND, M.D.,	
HENRY C. YARROW, M.D.	Dermatologist-in-Chief
RANDOLPH B. CARMICHAEL, M.D.	Associate Dermatologist
CHAS. W. RICHARDSON, M.D.	Laryngologist
D. KERFOOT SHUTE, M.D.	Ophthalmologist
W. K. BUTLER, M.D.	Ophthalmologist
E. G. SEIBERT, M.D.	Associate Laryngologist and Ophthalmologist
WALTER H. MERRILL, M.D.	Radiographer
F. F. RUSSELL, M.D.	Pathologist-in-Chief
J. S. NEATE, M.D.	Associate Pathologist
W. R. JOBSON, M.D.	Resident Physician
J. N. NEVILLE, M.D.	Assistant Resident Physician
F. P. MACHLER, M.D.	Assistant Resident Physician
G. P. DAVIS, M.D.	Assistant Resident Physician
C. L. BROCK.	Pharmacist and Extern
G. A. SCHAUB.	Extern
L. A. LA GARDE, JR.	Extern
Miss MARY BELLE STRUBLE.	Superintendent of Nurses

DISPENSARY.

A. F. A. KING, M.D.....	<i>Obstetrician-in-Chief</i>
STERLING RUFFIN, M.D.....	<i>Physician-in-Chief</i>
J. WESLEY BOVÉE, M.D.....	<i>Gynecologist-in-Chief</i>
WM. C. BORDEN, M.D.....	<i>Surgeon-in-Chief</i>
BENJ. R. LOGIE, M.D.....	<i>Director of the Dispensary</i>

General Medicine.

B. M. RANDOLPH, M.D.,	} <i>Attending Physicians</i>
W. A. FRANKLAND, M.D.,		
W. C. MOORE, M.D.,		
C. B. CONKLIN, M.D.,		
T. FRANCIS SMITH, M.D.,		

General Surgery.

J. LAWN THOMPSON, M.D.,	} <i>Attending Surgeons</i>
A. L. HUNT, M.D.,		
E. T. M. FRANKLIN, M.D.,		

Genito-Urinary Diseases.

FRANCIS R. HAGNER, M.D.....	<i>Genito-Urinary Surgeon</i>
HENRY R. ELLIOTT, M.D.,	} <i>Associates</i>
HOMER G. FULLER, M.D.,	

Gynecology.

J. L. RIGGLES, M.D.,	} <i>Attending Gynecologists</i>
V. B. JACKSON, M.D.,		
ADAM KEMBLE, M.D.,		

Obstetrics.

E. E. MORSE, M.D.,	} <i>Obstetricians</i>
J. M. CABELL, M.D.,		

Eye, Ear, Throat, and Nose.

E. G. SEIDERT, M.D.....	<i>Laryngologist and Ophthalmologist</i>
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Neurology.

B. R. LOGIE, M.D.....	<i>Neurologist</i>
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Electro-Therapeutics.

W. H. MERRILL, M.D.....	<i>Electro-Therapist</i>
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GENERAL STATEMENT.

The Department of Medicine of the George Washington University, in the chronological order of establishment, is the seventeenth Medical School in the United States. The first course of lectures began in March, 1825. For many years the school was known as the National Medical College; subsequently as the Department of Medicine of the Columbian University. By virtue of an act of Congress approved January 23, 1904, the Columbian University changed its name to "The George Washington University."

When first established, and for many years thereafter, this school, like most others in this country, gave only a two years' course of five months each. In 1878 the course was lengthened by the establishment of a Spring Session, devoted to lectures in certain special subjects. In 1879 the course was lengthened to seven months and attendance upon three annual sessions required and in 1893 attendance on four regular courses was made obligatory upon all candidates for the degree of Doctor of Medicine. In order to increase the facilities for actual bedside teaching, the University Hospital was established in 1898 and made a part of the Department of Medicine. In 1902 the old Medical College building, in which the exercises had been held since 1867, gave place to the present large and commodious structure.

The Medical Department of the University has been for several years a member of the Association of American Medical Colleges, and its students and graduates have the advantages arising from such membership. Its curriculum, while including all the subjects required by the standard of the Association of Medical Colleges, gives more hours to each subject, and has additional subjects which are of the greatest value in thorough preparation for the profession of medicine.

BUILDINGS AND OTHER FACILITIES.

The Buildings of the Medical Department consist of the Medical College Building and the University Hospital and Dispensary. They are most advantageously situated in the heart of the city near both systems of car lines. The University Hospital adjoins the Medical College Building, thereby making its clinical facilities directly available to the College. The pathological material and the material for clinical microscopy and clinical chemistry afforded by the Hospital and Dispensary, are directly used in the laboratories of the school.

The Medical College Building is a modern, commodious structure, with spacious, well-lighted, well-ventilated lecture and class rooms, and Histological, Bacteriological, Physiological, and Medical Laboratories.

The **Laboratories** are equipped with the most approved appliances, so that students may adequately pursue the laboratory courses and acquire the technical skill necessary in modern clinical and research methods. The dissecting-room is large, well-ventilated, and well-lighted by large skylights.

The **University Medical Library** is open for study and consultation from 9 a. m. to 9 p. m. It contains at present more than 2,500 volumes, and provision is made in the annual library fee charged every student to add to it as published the important new works on medicine. The most important medical periodicals are regularly received. The Library is an excellent working collection for the medical student, as it affords opportunity to adequately read up on the subjects presented in the courses.

The **Pathological Museum** contains a great many valuable and interesting specimens. Their number is increased by additions from time to time. These specimens are particularly valuable to the students as illustrating the changes produced by disease.

The *advantages of Washington as a place for pursuing the study of medicine are many.* This city now has over three hundred and thirty thousand inhabitants, providing abundant clinical material to the hospitals, which have an aggregate of over three thousand beds. In these hospitals clinical instruction, in addition to that given in the University Hospital, is given by members of the Faculty.

The great libraries and museums connected with the various Government institutions afford unparalleled facilities for study.

The Library of the Surgeon General's office of the United States Army is the most complete medical library in the world. This library, like all other libraries of the Government, is open to the public between the hours of 9 a. m. and 4.30 p. m. There is also the Library of Congress and the many excellent libraries of the various other Government offices.

The Army Medical Museum affords an unrivaled opportunity for studying the conditions met with in military surgery. It contains on exhibition a collection of anatomical and pathological specimens unequalled by any other museum. Other Government museums are the Museum of Hygiene, in connection with the Medical Department of the Navy and the National Museum which contains the most complete and best arranged collection of materia medica in the world. The drugs are shown in all their processes of manufacture. The Botanic Gardens, the Smithsonian Institution, the Fish Commission, the Department of Agriculture, all afford opportunities for study both in medicine and its collateral sciences.

On account of the many advantages offered in this city, the Army and Navy Medical Schools have been here located. The Alumni of this

College are largely represented in all public services, and have been highly successful in passing the rigid examinations by them. Ten per cent of the total number of the regular medical corps of the United States Army are graduates of this College.

Aside from the special advantages offered for the study of medicine, the cosmopolitan character of the city of Washington, its climate (not excessively cold in winter), its beauty, and its interests, which, as it is the seat of the General Government, are broad and national, make it an ideal place for the student to pass four years of preparation for the practice of a learned profession.

The Academic Year begins on the last Wednesday in September and ends on the second Wednesday in June. The next session, the ninetieth, begins September 27, 1910, and ends June 7, 1911.

Students must register promptly at the beginning of the session, in order that their time of study shall count as a full year.

Degrees are conferred at Commencement, the second Wednesday in June; at the Fall Convocation, the third Wednesday in October, and at the Winter Convocation, February 22.

ADMISSION.

Candidates for matriculation must show that they are fitted by previous education to study medicine. The requirements are those of the Association of American Medical Colleges and are as follows:

Candidates for matriculation must present creditable certificates of good moral character from two physicians in good standing.

The educational requirements for admission are those of the Association of Medical Colleges (equivalent to the 15 units of credit required for the College of Arts and Sciences), and are as follows:

(a) A Bachelor's degree from an approved college or university.

(b) A diploma from an accredited high school, normal school, or academy requiring for admission evidence of the completion of an eight-year course in primary and intermediate grades; and for graduation not less than four years of study.

(c) Candidates not having a Bachelor's degree or a diploma from an accredited high school or academy may be admitted upon passing an examination in the following branches:

A. Required (18 points); Mathematics (4 points); English (4 points); History (2 points); Language (4 points—Latin, French, German); Science (taken from physics, chemistry, botany, zoölogy). 4 points.

B. Optional (to 12 points taken from); English (2 points); History (6 points); Language (6 points); Manual Training (2 points); Mechanical Drawing (1 point); Natural Science (botany, biology, and

zoology, 2 points); Astronomy (1), Civics (1), Geology (1), Physical Geography (1), Physiology, and Hygiene (1), Political Economy (1).

This examination is conducted by examiners appointed by the Superintendent of Schools of the District of Columbia.

Examinations for admission to the first-year Medical class will be held in the latter part of September. Candidates desiring examination must notify the Dean before September 10.

Certificates from reputable instructors recognized by the State Board of Medical Examiners duly authorized by law or by the Superintendent of public instruction in States having no examining board may be accepted in lieu of any part of the examination.

A student may be allowed to enter on his medical work conditioned in not more than six points, and these conditions must be removed by satisfactory examination before he is allowed to enter on the second year of his medical course.

(One point in any subject in a high school or academic course demands not less than five periods per week of forty-five minutes each for eighteen weeks.)

As the laws relating to the preliminary educational qualifications required of students of medicine differ in many of the States of the Union, candidates are advised to make themselves familiar with the provisions of the medical statutes of the States in which they contemplate applying for license to practice. Attention to this precaution may save future embarrassment.

ADMISSION OF STUDENTS FROM OTHER SCHOOLS.

Students who have attended one or more terms at any other medical college in good standing, and who have the necessary preliminary educational requirements, may be admitted to advanced standing upon passing the examination required of students for the stage at which they propose to enter, or upon presenting certificates of examination covering courses equal to those in this College.

Students, approved by the Dean, not candidates for the degree of Doctor of Medicine, may be admitted as special students without examination to pursue any course they may elect.

SYSTEM OF INSTRUCTION.

The term of study for the degree of Doctor of Medicine consists of four years of eight months each.

Instruction is carried on by laboratory work, recitations, lectures, bedside instruction, and hospital and dispensary clinics. Particular stress is laid upon laboratory work and clinical teaching. The clinics of the University Hospital and Dispensary are utilized to the fullest extent, as the Hospital and the Medical College are under the same

control. Additional clinics are given in other hospitals in the city to which members of the faculty are attached.

While the greatest stress is laid upon laboratory work and the clinical teaching, it is recognized that the facts so obtained must be correlated and shown in their due relation to each other and to the science of medicine. To this end didactic lectures are maintained in certain branches, as they have been found necessary to give a systematic and comprehensive idea of the larger subjects in medicine. These lectures are followed by systematic and thorough quizzes, so that it may be certain that the students properly and thoroughly grasp the ideas presented by the lecturers.

The recitation and quiz work is made so complete that students do not need to employ private quizmasters.

The object sought throughout the courses is to thoroughly ground the students in the knowledge which is necessary to the practitioner of medicine. No particular attempt is made to graduate specialists in any subject. It is believed that the four years allowed are no more than sufficient time for the adequate preparation of the general practitioner.

The policy adopted by the College is to give a comprehensive, well-graded, and well-proportioned course—one that will adequately prepare the graduate to practice general medicine and meet the requirements of State Boards.

ORDER OF INSTRUCTION.

A general view of the subjects studied in each year is shown in the following table:

First Year.	Second Year.	Third Year.	Fourth Year.
Anatomy. Histology. Embryology. Physiology. General Chemistry.	Organic and Physiological Chemistry. Pathology. Bacteriology. Topographical Anatomy. Materia Medica. Pharmacology. Minor Surgery. Physical Diagnosis. Pathological Physiology.	Medicine. Surgery. Obstetrics. Therapeutics. Gynecology. Medical Jurisprudence. Clinical Microscopy. Dietetics. Clinics.	Medicine. Surgery. Obstetrics. Gynecology. Laryngology. Otology. Ophthalmology. Hygiene. Applied Anatomy. Dermatology. Psychiatry. Pediatrics. Neurology. Tropical Diseases. Clinics.

The greater part of the fourth year is devoted to clinical work in the hospitals. During this year, however, general instruction is also given in Mental Diseases, Neurology, Dermatology, Ophthalmology, Laryngology, and Otology. Not less than 1,000 hours of clinical work are required.

CLASSIFICATION OF STUDENTS.

Students are divided into four classes, according to their proficiency and the time spent, viz: first year, second year, third year, and fourth year. Students cannot advance to a higher class with more than one major condition. Students failing in any subject or subjects may be permitted at the next examination period a re-examination in the subjects in which they fail. The Faculty may dismiss any student from the school if in its judgment such student be deemed an unsuitable person, intellectually or otherwise, for the profession of medicine.

Optional Five-Year Course.

Since the session of 1904-05 a five-year optional course has been offered for the benefit of students. Students in this course take their subjects with the regular four-year classes, but as they take fewer subjects each year, they are able to devote more time to each study.

ANATOMY.

W. O. OWEN, M.D.....	Professor of Anatomy
J. L. RIGGLES, M.D.....	Associate in Anatomy
S. H. GREENE, JR., M.D.....	Instructor in Anatomy
E. P. MAGRUDER, M.D.....	Instructor in Anatomy
D. T. BIRTWELL, M.D.....	Instructor in Anatomy
HENRY I. STOUT, M.D.....	Instructor in Anatomy

The first-year course in Anatomy is given in a series of lectures, demonstrations, recitations from text-books, and practical laboratory work. The lectures are illustrated by lantern slides, models, and diagrams. The student is required to dissect satisfactorily the lateral half of a cadaver. Throughout the course every opportunity is taken to emphasize the application of anatomy to the practice of medicine in all its departments.

Osteology and Syndesmology are taught by recitations and demonstrations at the beginning of the course, preparatory to the more advanced studies in Anatomy.

In the second year a course in Topographical Anatomy is given, in which recitations and laboratory demonstrations are used to thoroughly

familiarize the student with the subject. In the fourth year a course is given in the general application of Anatomy to Medicine and Surgery. In this way a thorough preparation in general and applied anatomy is given.

First Year.

	Hours.			
	Lect.,	Rec.,	Dem.	Lab.
Gross Anatomy	120			360
				480

Second Year.

Topographical Anatomy	20			60
				80

Fourth Year.

Applied Anatomy	16			...
				16
Totals	156			420
				576

HISTOLOGY AND EMBRYOLOGY.

H. W. LAWSON, M.S., M.D.... Professor of Histology and Embryology
CLARA S. LUDLOW, Ph.D..... Instructor

Instruction is given in the care and use of the microscope and in the preparation of tissues for microscopical examination, and a systematic study is made of the minute structure of the tissues and organs of the body, the laboratory work being supplemented by recitations.

First Year.

	Hours.			
	Lect.,	Rec.,	Dem.	Lab.
Histology	32			96
Embryology	16			48
				64
Totals	48			144
				192

PHYSIOLOGY.

SHEPHERD IVORY FRANZ, Ph. D..... Professor of Physiology
HENRY R. ELLIOTT, M.D..... Associate in Physiology
JOHN P. FILLEBROWN, M.D..... Instructor in Physiology

The course in Physiology consists of lectures, recitations, conferences, demonstrations, and laboratory exercises, during the second half of the first year. The lectures cover all the important facts and theories

regarding bodily functions, and are illustrated by diagrams, models, and prepared specimens. Recitations are held on assigned parts of the text-book. Conferences are held on special physiological topics, and for these exercises each student is required to prepare one thesis during the semester. In the laboratory each student performs a number of experiments on blood, on the circulation, on digestion, on the general functions of muscle and nerve, on the nervous system, and on the special senses. The student is required to make and keep records of the experiments, and these are criticised by the instructors. The class is divided into sections so that each student receives a large amount of personal attention. In the second year a series of exercises is held in which special emphasis is laid on the relation of normal physiological function to the disturbances of function in disease, and upon the physiological action of drugs. It is intended in this way to bring the work of the Physiological Laboratory and other exercises into closer relation with the succeeding courses in Pathology, Therapeutics, and General Medicine.

First Year.

	HOURS.			
	Lect.	Rec.	Dem.	Lab.
Physiology		48		192
				Total.
				240

Second Year.

Pathological Physiology	16	16
Totals	48	208	256

CHEMISTRY.

CHARLES E. MUNROE, Ph.D.... Professor of Chemistry and Toxicology

EDWARD G. SEIBERT, M.D..... Associate in Chemistry and Instructor in

Ophthalmology

THOMAS M. PRICE, Ph.D..... Instructor in Biochemistry

OTIS D. SWETT, B.S..... Instructor in Chemistry

General Chemistry. A series of illustrated lectures accompanied by recitations, laboratory work, and exercises, on theoretical, inorganic, organic, and technical chemistry.

Organic Chemistry. A series of lectures, laboratory work, and recitations on the acyclic and cyclic hydrocarbons and their derivatives, with special reference to physiology and medicine.

Physiological Chemistry. A series of lectures, laboratory work, and recitations on the proximate principles of the human body.

Biochemistry. A laboratory course in the chemical examination of some of the chief foodstuffs, the tissues and fluids of the body, and the products of certain organisms; also the isolation of the digestive enzymes and a study of their action *in vivo*. DR. PRICE.

Clinical Chemistry. A thorough course is given in which material from the University Hospital and Dispensary is utilized to show the practical application of this subject in medicine.

First Year.

	Hours.			Total.
	Lect., Rec., Dem.	Lab.		
General Chemistry	96	96		192

Second Year.

Organic Chemistry	32	32	64
Physiological Chemistry	24	56	80

Third Year.

Clinical Chemistry	24	24
Totals	152	208	360

MATERIA MEDICA AND THERAPEUTICS.

B. M. RANDOLPH, M.D.....	Professor of Materia Medica and Therapeutics
NOBLE P. BARNES, M.D.....	Associate Professor of Materia Medica and Therapeutics
HENRY R. ELLIOTT, M.D.....	Associate in Pharmacology
WALTER H. MERRILL, M.D.....	Instructor in Electro-Therapeutics

Second year. (1) Lectures upon Materia Medica, including a demonstration of drugs and their preparations. (2) Recitations upon the preparations, their doses, and the various antidotes for poisons. (3) **Practical exercises in prescription writing.** (4) Demonstrations of drugs.

Third year. (1) Systematic lectures upon the physiological action of drugs and their effects in health and disease, their therapeutic uses, and their methods of administration. (2) Lectures and section demonstrations in electro-therapeutics. (3) Prescription writing, in which the students are given hypothetical cases for which to prescribe, the prescriptions being reported before the class for criticism and discussion.

Second Year.

	Hours.		
	Lect.,	Rec., Dem.	Lab. Total.
Bacteriology	45	135	180
Pathology	40	200	240
Clinical Microscopy	72	72
Totals	85	407	492

I. W. BLACKBURN, M.D.....Professor of Morbid Anatomy

The instruction in this course is very practical, consisting of post-mortem examinations, demonstrations, and illustrative lectures pertaining to the subjects of morbid anatomy and special pathology. Especial attention is paid to the study of the gross pathology of diseases of the brain and nervous system. Instruction in the technique of post-mortem examinations for scientific purposes and in medico-legal cases is a feature of the course.

	Hours.				
	Lect.	Rec.	Dem.	Lab.	Total
Morbid Anatomy	20	20

STERLING RUFFIN, M.D.	Professor of Medicine
GEO. N. ACKER, A.M., M.D.	Clinical Professor of Medicine
THOS. A. CLAYTOR, M.D.	Clinical Professor of Medicine
C. S. BUTLER, M.D., Surg. U.S.N.	Professor of Tropical Diseases
JAMES DUDLEY MORGAN, A.B., M.D.	Associate Professor of Medicine and Clinical Professor of Medicine
J. B. NICHOLS, M.D.	Associate in Medicine
H. H. DONNALLY, A.M., M.D.	Associate in Medicine
W. A. FRANKLAND, M.D.	Clinical Associate in Medicine
W. W. WILKINSON, M.D.	Associate in Medicine
CHARLES W. HYDE, M.D.	Instructor in Medicine
SOTHORON KEY, M.D.	Instructor in Medicine
W. C. MOORE, M.D.	Instructor in Medicine
C. B. CONKLIN, M.D.	Instructor in Medicine
T. FRANCIS SMITH, M.D.	Instructor in Medicine

Instruction in Medicine is so given as to conform to the most modern requirements. The work begins in the second year with a complete course in history-taking and normal physical diagnosis, and is continued through the third and fourth years. During the latter two years the course consists of lectures, recitations, a study of case histories, clinical conferences, and practical work in the clinical laboratory and at the bedside. The work is made as practical as possible.

The third-year class is divided into small sections, which are required to attend the daily dispensary service in the University Hospital, where they are drilled especially in history-taking and in the technique of practical physical diagnosis.

The fourth-year class is similarly divided into small sections, and these are required to attend the daily ward clinics in the University Hospital and ward clinics in the Garfield Memorial Hospitals, Children's Hospital, and the Tuberculosis Hospital of the District of Columbia.

The system of ward clinics to small groups of students affords a most effective method of studying disease and gives to every student an opportunity of following a large assortment of diseases from their commencement to the termination of illness; in no other way is it possible to get a more practical knowledge of the methods of studying disease or a more intimate knowledge of disease itself.

Every patient in the medical wards of the University Hospital is assigned to one, or at most two, senior students, who are required (under proper supervision) to take the history, to make and record a complete physical examination, to determine after due study the nature of the illness (diagnosis), to outline a plan of treatment, and to make daily notes of the progress of the case.

A weekly amphitheater clinic is given to third-year students in a body and a similar clinic to the fourth-year class. A series of special neurological clinics is provided for the senior class at the Government Hospital for the Insane, where there is a great wealth of material.

Second Year.

	HOURS.			
	Lect.,	Rec.,	Dem.	Clinics.
Physical Diagnosis		64		...
				Total.
				64

Third Year.

General Medicine	128	128	256
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Fourth Year.

General Medicine	128	192	320
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Totals	320	320	640
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TROPICAL MEDICINE.

C. S. BUTLER, M.D., Surg. U.S.N., Professor of Tropical Diseases,
Instructor in Bacteriology and Tropical Diseases,
U. S. Navy Medical School

The course in tropical diseases is similar to that given in the Army and Navy Medical Schools, and consists of didactic lectures, quizzes, and laboratory instruction, with particular reference to the parasitic, protozoal diseases common in the tropics and in the southern part of the United States.

Fourth Year.

	Hours.
Tropical Medicine, 1 hour, Oct.-May.....	16

PSYCHIATRY AND CLINICAL NEUROLOGY.

WILLIAM A. WHITE, M.D., Superintendent of the Government Hospital for the Insane.....Professor of Psychiatry and
Clinical Neurology
B. J. LOGIE, M.D.....Instructor in Neurology, Psychiatry, and
Clinical Neurology
GEO. H. SCHWINN, M.D.....Instructor in Psychiatry and Neurology
H. W. MILLER, M.D.....Instructor in Psychiatry and Neurology

A series of lectures and clinics is given upon the subject of insanity in its various forms.

Many of these clinics are given at the Government Hospital for the Insane, which, with its more than two thousand beds, affords one of the largest clinics in this country.

Fourth Year.

	Hours.
Psychiatry and Neurology, 1 hour, Jan.-May. DR. WHITE.....	20
Clinical Psychiatry, 1 hour, Jan.-May. DRS. SCHWINN and MILLER.....	20

PEDIATRICS.

GEORGE N. ACKER, A.M., M.D.....Professor of Pediatrics
FRANK FREMONT-SMITH, M.D.....Associate in Pediatrics
EDGAR P. COPELAND, M.D.....Associate in Pediatrics
W. T. FRENCH, M.D.....Instructor in Pediatrics

Didactic and clinical lectures are given upon diseases of infants and children and the importance of the proper management of these diseases by diet and hygiene.

The children's clinic, at the Children's Hospital, affords ample material for practical teaching in this branch.

Fourth Year.

	Hours.		
	Lect., Rec., Dem.	Clinics.	Total.
Pediatrics	32	62	94

PHYSICAL DIAGNOSIS.

W. W. WILKINSON, M.D.....Associate in Medicine

A complete course is given in this subject by means of recitations, section work on normal subjects, and with clinical cases which typically represent diseased conditions.

Second Year.

	Hours.		
	Lect., Rec., Dem.	Clinics.	Total.
Physical Diagnosis	32	32	64

SURGERY.

WILLIAM CLINE BORDEN, M.D.....Professor of Surgery
 A. R. SHANDS, M.D.....Professor of Arthopedic Surgery
 ARTHUR A. SNYDER, M.D.....Clinical Professor of Surgery
 FRANCIS R. HAGNER, M.D.....Professor of Genito-Urinary Surgery
 CHARLES S. WHITE, M.D.....Associate in Surgery
 JOHN R. WELLINGTON, M.D.....Clinical Professor of Surgery
 W. F. M. SOWERS, A.B., M.D.....Associate in Surgery
 L. H. REICHELDERFER, M.D.....Clinical Professor of Surgery
 H. W. LAWSON, M.D.....Associate in Surgery
 I. LAWN THOMPSON, M.D.....Instructor in Surgery
 CHARLES W. HYDE, M.D.....Instructor in Minor Surgery
 A. L. HUNT, M.D.....Instructor in Minor Surgery
 E. T. M. FRANKLIN, M.D.....Instructor in Surgery
 L. M. HYNSON, M.D.....Assistant in Surgery
 CLINE CHAPMAN, M.D.....Instructor in Minor Surgery

The principles of surgery are presented in a systematic course of lectures, so that the student may obtain a comprehensive and adequate concept of the science and art of surgery. These lectures are followed by recitations held twice a week, so that the subject-matter may be thoroughly impressed upon the students. The special divisions of surgery are taught by associates and instructors who have made specialties of these branches. The clinical material in the University Hospital and Dispensary, being under the control of the Faculty, is directly used throughout the course to illustrate the subjects taught and to familiarize the students with actual clinical conditions.

Surgical technique is taught by instruction in the preparation of materials used in antiseptic and aseptic surgery, the preparation of the patient, and the sterilization of instruments. Practical instruction is given in the Hospital and Dispensary in the application of splints, bandages, and dressings used in the various surgical diseases and injuries. Thorough instruction and practical demonstrations are given in the administration of anæsthetics. Surgical pathology is taught by thorough instruction in the gross and microscopic appearance of surgical diseases and injuries, and by a systematic course of lectures and quizzes by which the etiology, pathology, symptomatology, and treatment of the surgical affections and their relations to each other are shown.

Clinical teaching is carried on in the University Hospital and Dispensary, and in other hospitals of the city to which members of the faculty are attached. Amphitheater clinics are given, in which the general practice of surgical diagnosis and operative technique and therapeutic procedure are shown.

Ward clinics and bedside instruction are made a prominent part of the course. The class is divided into sections, which are regularly assigned to clinical work in the University Hospital and Dispensary, and in other hospitals. Students are assigned to work in the surgical outpatient departments of the different hospitals, and practical work is required of each student in the preparation of dressings, sterilization of instruments, etc.

In the fourth year a thorough course is given in surgical anatomy and operative surgery of the cadaver, in connection with which the instructor takes up a general review of anatomy, so that the student may be thoroughly prepared for State Board examinations for graduation.

Orthopedics.—A course of lectures and recitations on the pathology, etiology, course, termination, and treatment of chronic joint diseases, with clinical instruction in the application of special apparatus and of plaster of Paris to the correction of deformities.

Instruction in genito-urinary surgery and in cystoscopy is given in clinics in section work and by recitations from text-book.

Second Year.

	Hours.		Total.
	Lect., Rec., Dem.	Clinica.	
Minor Surgery	64	...	64

Third Year.

	Hours.				
	Lect., Rec., Dem.	Clinics.	Total.		
General Surgery	96	256	496		
<i>Fourth Year.</i>					
General Surgery	96				
Orthopedics	24				
Genito-Urinary	24				
Totals	304	256	560		

OBSTETRICS.

A. F. A. KING, A.M., M.D., LL.D.....	Professor of Obstetrics, Dean Emeritus
EDWARD E. MORSE, M.D.....	Associate in Obstetrics
JULIAN M. CABELL, M.D.....	Associate in Obstetrics
H. S. MEDFORD, M.D.....	Instructor in Obstetrics

The course in Obstetrics comprises a series of lectures on the science and art of midwifery, together with practical work. The chief purpose of the lecturer is to arrange, simplify, and explain the matters studied in the text-books so as to render them more easily intelligible and to indicate their relative importance. The lectures are illustrated by diagrams, models, manikins, natural preparations, and instruments. The class is divided into sections, and each student performs various obstetrical operations upon the manikin and receives practical instruction in external pelvimetry and the methods of abdominal palpation and auscultation during pregnancy. Recitations from text-books are held throughout the term. In the fourth year clinical instruction in obstetrics is given, the class being divided into small sections and each section being required to attend a stated number of cases.

Third Year.

	Hours.			Total.
	Lect., Rec., Dem.	Clinics.		
Obstetrics	128	*		128
<i>Fourth Year.</i>				
Obstetrics	32	*		32
Totals	160	...		160

*Number of clinic hours cannot be given, but each student is required to see five cases, exclusive of demonstration work.

GYNECOLOGY.

J. WESLEY BOVÉE, M.D.....	Professor of Gynecology
G. BROWN MILLER, M.D.....	Associate in Gynecology
A. L. STAVELY, M.D.....	Clinical Professor of Gynecology
W. A. FRANKLAND, M.D.....	Instructor in Clinical Gynecology
J. LEWIS RIGGLES, M.D.....	Instructor in Gynecology
VIRGIL B. JACKSON.....	Instructor in Gynecology
ADAM KEMBLE, M.D.....	Instructor in Gynecology

Gynecology as taught in the third year comprises a course of lectures and text-book recitations. In the fourth year the class is taken in sections of one to two students each into the Gynecological Dispensaries for clinical instruction in examinations, diagnosis, and treatment. In larger sections the class attends amphitheater clinics given by the Professors of Gynecology and Clinical Gynecology.

Third Year.

	Hours.		
	Lect., Rec., Dem.	Clinics.	Total.
Gynecology	32	32	64

Fourth Year.

Gynecology	32	32	64
Totals.....	64	64	128

LARYNGOLOGY AND OTOTOLOGY.

CHARLES W. RICHARDSON, M.D..	Professor of Laryngology and Otology
E. G. SEIBERT, M.D.....	Associate in Laryngology and Otology
O. A. M. McKIMMIE, M.D.....	Instructor in Laryngology and Otology
H. S. DYE, M.D.....	Instructor in Laryngology and Otology

This course comprises lectures and clinical instruction on diseases of the nasal passages, pharynx, larynx, and also the ear. Practical demonstrations are given in the use of the laryngoscope and other instruments required in these special branches.

Fourth Year.

	Hours.
Lectures, 3 hours, Oct.-Nov. Professor RICHARDSON.....	24
Clinics. Professor RICHARDSON, Dr. DYE, Dr. McKIMMIE, and Dr. SEIBERT	24

OPHTHALMOLOGY.

W. K. BUTLER, M.D.....	Professor of Ophthalmology
D. KERFOOT SHUTE, A.B., M.D....	Associate Professor of Ophthalmology
E. G. SEIBERT, M.D.....	Associate in Ophthalmology

The course of lectures on this subject is to direct attention to the elementary principles of the subject. It is not intended to qualify the student as a specialist, but to give him a knowledge of what every general practitioner ought to know. The course is supplemented by clinical instruction.

Fourth Year.

Lectures, 1 hour, Oct.-Dec. Professor BUTLER.....	Hours. 12
Clinics. Professors BUTLER and SHUTE, and Dr. SEIBERT.....	12

DERMATOLOGY.

H. C. YARROW, M.D.....	Professor of Dermatology
R. B. CARMICHAEL, M.D.....	Clinical Professor of Dermatology

The lectures on this subject are illustrated by diagrams, models, photographic illustrations of disease from life, and also by the exhibition of cases. In connection with the course clinical instruction is given.

Fourth Year.

Lectures, 1 hour, Oct.-Dec. Professor YARROW.....	Hours. 14
Clinics, Oct.-Dec. Professors YARROW and CARMICHAEL.....	12

HYGIENE.

D. W. PRENTISS, M.D.....	Professor of Hygiene
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The course in Hygiene is given principally by recitation from a prescribed text-book. Consideration is given to domestic and municipal sanitation and to the principles underlying legislative interference in matters of public health.

Fourth Year.

Lectures and recitations, 1 hour. Professor PRENTISS.....	Hours. 32
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MEDICAL JURISPRUDENCE.

W. C. WOODWARD, M.D.....	Professor of Medical Jurisprudence
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This course is designed to familiarize students with the rights and

obligations of physicians, both legal and ethical, and to qualify them to apply the facts of medical science to the solution of problems in law.

Third Year.

	Hours.
Lectures, 1 hour, Feb.-May. Professor WOODWARD.....	16

CLINICAL FACILITIES.

The following hospitals are open to the students of this school for clinical study, and are extensively used for that purpose:

University Hospital, H St., between Thirteenth and Fourteenth Sts., N. W., and adjacent to the Medical Building.—This hospital is a part of the educational equipment of the University. It is an integral part of the Department of Medicine, is entirely controlled by the Faculty of Medicine, and is used primarily in instructing the students in clinical medicine, surgery, and obstetrics. It has also in connection with it an out-patient or dispensary service in all departments.

The staff is composed of members of the Faculty of Medicine.

Garfield Memorial Hospital, Florida Ave. and Tenth St., N. W.—This institution has 118 charity beds. Clinics are given regularly throughout the session by members of the Faculty connected with the visiting staff of the hospital. There is also an out-patient department, giving good opportunities for experience in the practice of physical diagnosis.

Members of the Faculty on the visiting staff: Professors CLAYTOR and MORGAN, Clinical Medicine; Professors SNYDER, WELLINGTON, and REICHELDERFER, Clinical Surgery; Professor STAVELY, Clinical Gynecology; Professor CARMICHAEL, Clinical Dermatology; Professors SHUTE and BUTLER, Clinical Ophthalmology; Professor HAGNER, Clinical Genito-Urinary Surgery; Professor YARROW and Dr. FREMONT-SMITH, Consulting Physicians.

Children's Hospital, W St., between Twelfth and Thirteenth Sts., N. W.—Regular instruction is given in the medical and surgical wards by members of the Faculty on the visiting staff of the hospital. This institution has 100 charity beds. There is also a large out-patient department.

Members of the Faculty on the visiting staff: Professors KING and YARROW, Consulting Physicians; Professor WELLINGTON, Clinical Surgery; Professor ACKER and Drs. COPELAND and FREMONT-SMITH, Clinical Medicine.

Emergency Hospital and Central Dispensary, Fifteenth St. and Ohio Ave., N. W.—This hospital has 36 charity beds, and has a very

large out-patient service. The large emergency service gives exceptional facilities in clinical surgery.

Members of the Faculty on the visiting staff: Professor HAGNER, Clinical Genito-Urinary Diseases; Professor RUFFIN, Consulting Physician; Drs. WHITE and JACKSON, Surgery; Professor MORGAN and Dr. ELLIOTT, Clinical Medicine; Professor CARMICHAEL, Clinical Dermatology; Dr. MILLER, Clinical Gynecology; Professor SHANDS, Orthopedics; Professor SHUTE, Ophthalmology; Dr. FRENCH, Pediatrics.

Columbia Hospital for Women, Twenty-fifth St. and Pennsylvania Ave., N. W.—This hospital has 68 charity beds for diseases peculiar to women, and 50 charity maternity beds. Both the obstetrical and the gynecological services are particularly good.

Members of the Faculty on the visiting staff: Professor BOVEE and Dr. MILLER, Clinical Gynecology; Drs. KELLY and CABELL, Clinical Obstetrics; Professor SHUTE, Ophthalmology; Professor RUFFIN, Visiting Physician.

Providence Hospital, Second and D Sts., S. E.—This institution has a large charity service—100 beds for medical and surgical cases and 30 maternity beds.

Members of the Faculty on the visiting staff: Professor RICHARDSON, Clinical Laryngology and Otology; Professor SHUTE, Clinical Ophthalmology; Dr. SOWERS, Clinical Surgery; Professor CARMICHAEL, Dermatology; Dr. MORSE, Obstetrics.

The Government Hospital for the Insane.—This hospital is maintained by the United States Government. It has 2,500 beds. Clinical instruction in mental diseases is given by the superintendent of the hospital, Professor W. A. WHITE, and Drs. SCHWINN and MILLER. Other members of the Faculty on service at this hospital are Professors FRANZ and BLACKBURN; Professor SHUTE, Consulting Ophthalmologist; Professor RUFFIN, Consulting Physician.

Episcopal Eye, Ear, Throat, and Nose Hospital, Fifteenth St., between L and M Sts., N. W.—Excellent opportunities for clinical instruction in ophthalmology, otology, laryngology, and rhinology are offered by this hospital.

Members of the Faculty on its staff: Professor RICHARDSON, Clinical Otology and Laryngology; Drs. McKIMMIE and DYE, Clinical Otology and Laryngology; Professor ACKER, Consulting Physician.

Lutheran Dispensary, Fourteenth and N Sts., N. W.—This dispensary affords good opportunities for clinical study of diseases of the eye, ear, throat, and nose.

Members of the Faculty on its staff: Professor BUTLER, Surgeon-in-

Charge; Dr. SEIBERT, Ophthalmology; Professor ACKER, Consulting Physician.

Casualty Hospital, 708 Massachusetts Ave., N. E.—Opportunities in emergency and dispensary work are offered by this institution.

Members of the Faculty on its staff: Professor ACKER, Consulting Physician; Dr. BARNES, Clinical Medicine; Dr. MEDFORD, Obstetrics.

Woman's Clinic, 1237 T St., N. W.—Members of the Faculty on its staff: Professor YARROW, Consulting Physician; Professor SNYDER, Attending Surgeon.

Tuberculosis Hospital, 14th and Upshur Sts., N. W.—Members of the Faculty on its staff: Professor CLAYTOR and Dr. RANDOLPH, Clinical Medicine; Dr. REICHELDERFER, Clinical Surgery; Professor RICHARDSON, Ophthalmology.

EXAMINATIONS.

Examinations are held at the end of the course in each subject. Students failing in examination will be permitted to be re-examined at the next regular examination period. Students who fail in re-examination must repeat all subjects of the previous year in which they did not obtain a grade of 85 or more. Students who fail to appear at the regular examinations will not be examined until the next regular examination, except by special permission of the Faculty, and in this event an extra fee of \$5.00 will be charged. Students who fail to pass satisfactorily their practical laboratory examinations will be required to repeat the laboratory courses and pay the regular laboratory fees. Students will not be admitted to examination unless they have paid all fees due at the time or present a permit signed by the Treasurer. In order to avail themselves of the privilege of re-examination students must file their applications with the Dean not later than fifteen days before the date set for the examinations.

In addition to the examinations students are required: To dissect satisfactorily one lateral half of a cadaver; to report satisfactorily an analysis of specimen of urine and a clinical examination of a specimen of blood; to examine and report upon six clinical cases in general medicine and two cases in surgery; to perform satisfactorily two major surgical operations upon the cadaver; to work not less than two weeks in the Dispensary Service of the University or other hospitals; to work not less than two weeks in the Clinical Laboratory of the University or of some other hospital approved by the Dean; to take charge of three or more obstetrical cases and to report thereon; to examine and report on one case in either ophthalmology, laryngology, otology, dermatology, or orthopedics; to report upon one case in gynecology.

Proficiency is marked upon a scale of 100. A grade of 75 is required to pass an examination.

Students do not receive their numerical grades, but are notified that they have attained grades A, B, C, D, E, or F, as the case may be. A signifies 96 to 100; B signifies 90 to 95; C signifies 85 to 89; D signifies 75 to 84; E signifies failure; F signifies failure to appear for examination.

REQUIREMENTS FOR DEGREES.

Every candidate for the degree of Doctor of Medicine must be at least twenty-one years of age and of reputable character. He must have complied with the admission examination and other requirements herein set forth. He must file with the Dean, at least 30 days before the dates fixed for conferring of degrees, a notice of his intention to appear for graduation, and he must be present at the time specified for examination, and also at Commencement or Convocation. The degree is not conferred in the absence of a candidate except by special consent of the President's Council. Graduates of other accredited colleges must spend one year in residence at this school.

To be eligible for graduation the candidate must pass all his examinations.

Candidates who in their work and examinations attain general averages of 90 or more will be presented to the Faculty for consideration with reference to being designated as "having graduated with distinction." If in the opinion of the Faculty such candidates have shown themselves to be possessed of more than ordinary merit, they will have inscribed upon their diplomas beneath their degree the words "with distinction."

Candidates who have completed their courses, but have not passed their final examinations, may take the fall or the winter re-examinations upon payment of a fee of \$10, and, if successful, receive their diplomas at the Fall or Winter Convocation, as the case may be, upon the payment of the diploma fee.

A student who has failed of graduation after repeating his final year will not be permitted to maintain his connection with the school.

SCHOLARSHIPS.

Eight scholarships are provided for students.

CORCORAN SCHOLARSHIPS.—In recognition of the liberality of the late W. W. Corcoran, the University has established in this department six free scholarships.

Two of these scholarships are open for competitive examination to the graduates of the several high schools of the District of Columbia and are awarded to the two students whose averages are highest.

Two scholarships are open for competitive examination to graduates of any reputable high school or college who shall give satisfactory written evidence of pecuniary inability and certificates of good moral character and industry. These two scholarships are awarded to the two graduates whose averages are highest.

The remaining two scholarships are open for competitive examination to students who, though not graduates of any high school or college, give satisfactory evidence that they are fitted by previous education for the study of medicine, and at the same time give satisfactory written evidence of pecuniary inability and certificates of good moral character and industry. These two scholarships are awarded to the two students whose averages are highest.

In establishing these averages professional aptitude and general qualifications are considered along with scholastic ability.

MEDICAL MISSIONARY SCHOLARSHIPS.—Two Medical Missionary Scholarships will be given to such applicants as are judged by the President of the University best qualified to enter upon the study of medicine for the purpose of becoming medical missionaries. These scholarships are awarded for one year only, but they may be renewed.

Applications for scholarships should be filed with the Dean not later than September 10. Students holding scholarships pay the matriculation, library, laboratory, and graduation fees, and make the deposit to cover breakage. Holders of scholarships must also maintain a satisfactory scholastic average.

PRIZES.

A general examination prize of \$50 is annually awarded to the candidate for graduation who attains the highest average grade in all subjects.

Professor H. C. YARROW gives a prize for the best examination in Dermatology.

Professor CHARLES W. RICHARDSON gives a prize for the best examination in Laryngology and Otology.

Professor ACKER gives a prize for the best examination in Pediatrics.

Professor BUTLER gives a prize for the best examination in Ophthalmology.

Professor HAGNER gives a prize for the best examination in Genito-Urinary Diseases.

HOSPITAL APPOINTMENTS.

Interns are annually appointed in the University Hospital. The externs are appointed from graduates and from the fourth-year class. These appointments are made upon competitive examinations under conditions determined by the governing authorities of the Hospital. Appointments to similar positions are open to the graduates and

undergraduates of this school in the following other hospitals of the city: Garfield Memorial Hospital, Emergency Hospital, Columbia Hospital for Women, Casualty Hospital, Providence Hospital, Washington Asylum Hospital, Children's Hospital, Episcopal Eye, Ear, Throat, and Nose Hospital.

FEES AND CONTINGENT EXPENSES.

1. Matriculation fee (payable once).....	\$5
2. Annual library fee.....	3
3. Tuition fee per annum, including all charges for materials.....	150
4. Fee for graduation	10
5. Tuition fee per annum for any year repeated once, or for a fifth year	75
In addition to the tuition fees for special or repeated laboratory courses, a charge will be made for materials used.	
6. Fee for a certificate under the seal of the University.....	2
7. Auditors are admitted to lecture courses for the regular tuition fees, but are not permitted to take active part in the work of the classes, and will not be allowed credit, in a subsequent course of studies leading to a degree, for attendance as auditors. No matriculation or library fee is charged.	

No change will be made in the fees fixed at registration except in case of withdrawal, and then only upon notice in due form, and from the end of the current quarter session, when such withdrawal shall be approved. Applications for the granting of a withdrawal should be made on the prescribed form to be obtained from the Secretary, and will be received only at the end of a quarter session.

Students are urged to purchase their own microscopes, but those who do not care to do so may rent them from the University at the following rates:

Microscope for Histological Laboratory use.....	\$3
Microscope for Bacteriological, Pathological, and Clinical Microscopy Laboratory use.....	5

PAYMENT OF FEES.

All fees are to be paid to the Treasurer. Tuition fees are payable quarterly, in advance. Matriculation, library, and laboratory fees are payable in full, in advance.

WITHDRAWALS.

A certificate of work actually done will be given to any student wishing to withdraw or transfer to some other school during the session.

Written notice of such withdrawal or transfer must be filed with the Dean at the time of requesting the certificate, and the student must have paid all fees and dues chargeable against him up to the end of the quarter in which he withdraws.

BOARD AND ROOMS.

A register of approved boarding houses is kept by the Treasurer. Accommodations cost from \$25 to \$40 a month.

For catalogues, application blanks, and further information, address

THE DEAN,
Department of Medicine,
The George Washington University,
1325 H St., N. W., Washington, D. C.

DEPARTMENT OF DENTISTRY.

FACULTY.

CHARLES H. STOCKTON, LL.D.,	ACTING PRESIDENT OF THE UNIVERSITY
J. ROLAND WALTON, D.D.S.,	Professor of Prosthetic Dentistry and Orthodontia, and Dean, 702 10th St., N. W.
HENRY C. THOMPSON, D.D.S.,	Professor of Operative Dentistry
CHARLES E. MUNROE, Ph.D.,	Professor of Chemistry
SHEPHERD IVORY FRANZ, Ph.D.,	Professor of Physiology
CHARLES S. WHITE, M.D.,	Professor of Oral Surgery
HURON W. LAWSON, M.D.,	Professor of Histology and Embryology
FREDERICK FULLER RUSSELL, M.D.,	Professor of Pathology and Bacteriology
W. O. OWEN, M.D.,	Professor of Anatomy
B. M. RANDOLPH, M.D.,	Professor of Materia Medica and Therapeutics
E. G. SEIBERT, M.D.,	Associate in Chemistry
J. R. DE FARGES, D.D.S.,	Associate Professor of Metallurgy, Professional Ethics, Dental Jurisprudence and Economics
ALLEN S. WOLFE, D.D.S.,	Associate Professor of Crown and Bridge Work and Porcelain
CHARLES BASSETT, D.D.S.,	Associate Professor in Charge of the Dental Infirmary
CADMUS LINDEN ODOR, D.D.S.,	Associate Professor of Operative Technics and Comparative Anatomy
W. FRANCIS LAWRENCE, D.D.S.,	Associate Professor of Prosthetic Technics
NOBLE P. BARNES, M.D.,	Associate Professor of Materia Medica
JULIAN GARTRELL, D.D.S.,	Lecturer on Oral Prophylaxis
W. B. HOOFNAGLE, D.D.S.,	Lecturer on Materia Medica
S. H. GREENE, JR., M.D.,	Instructor in Anatomy
J. L. RIGGLES, M.D.,	Associate in Anatomy
OTIS D. SWETT, M.S.,	Instructor in Chemistry
C. G. SHOEMAKER, D.D.S.,	Instructor in Operative Technics
J. WINSLOW TAYLOR, D.D.S.,	Instructor in Prosthetic Technics
HENRY CISSEL YOUNG, D.D.S.,	Instructor in Prosthetic Technics
HERBERT C. HOPKINS, D.D.S.,	Instructor in Orthodontia Technics
E. P. MACRUDER, M.D.,	Instructor in Anatomy
D. T. BIRTWELL, M.D.,	Instructor in Anatomy
HENRY I. STOUT, M.D.,	Instructor in Anatomy
EWING MARVIN WOOD BEAR, D.D.S.,	Demonstrator in the Infirmary
MELVILLE P. ESLIN, D.D.S.,	Demonstrator in the Infirmary
JAMES N. ROBINSON, D.D.S.,	Demonstrator in the Infirmary

Special Lecturers.

M. F. FINLEY, D.D.S.
A. D. COBEY, D.D.S.

ROBERT E. LAYTON, D.D.S.
GEORGE M. SHARP, D.D.S.

GENERAL STATEMENT.

The first course of lectures in the Dental School began November, 1887, under the title of "The Columbian University Dental Department." The course then extended over two years of five months each. Two years later the course was extended to seven months; but, this additional time being found inadequate to keep pace with the ever-increasing demand for higher dental education, the course was gradually increased, until now it extends over three years of eight months each.

The academic year begins on the last Wednesday in September and ends on the second Wednesday in June. The next session will begin September 29, 1909. Students should register promptly at the office of the Dean at the beginning of the session, and no student can be received and credited with a full term after ten days from the first lecture. Final examinations are held at the conclusion of the instruction in each subject. The degrees are conferred at Commencement, the first Wednesday in June, the Fall Convocation, and at the Winter Convocation, February 22. For further information communicate with the Dean of the Dental Department or the Secretary of the University.

ADMISSION.

Candidates for matriculation must show that they are fitted by previous education to study dentistry. For this purpose they must present a satisfactory certificate of their attainments from an approved school or college, or they must pass an examination.

Candidates are admitted without examination:

(1) Upon presenting a diploma or certificate of a reputable college conferring on them the degree of A.B. or B.S., or an equivalent degree in the arts and sciences.

(2) Upon presenting a diploma or certificate of graduation from a high school, academy, or preparatory school approved by the University as maintaining an adequate standard.

(3) Upon presenting a certificate of admission to the Freshman class of an approved college.

(4) Upon presenting a certificate of admission to another dental school approved by the University as maintaining an adequate standard.

Candidates unable to comply with the foregoing requirements are admitted upon passing an examination based upon the general requirement for admission to the third-year high school or its equivalent, modified to meet the regulations of State Dental Boards.

The scope of the different subjects is indicated in standard high school text-books.

A candidate may offer certificates of an approved school for work done in any preparatory subjects, and will be credited with the units represented by such work. A candidate failing to pass in two of three subjects of his examination may be admitted to the first year upon the condition that he make up the deficiency before entering the second-year class. The examinations are conducted by examiners appointed by the Superintendent of Schools of the District of Columbia.

The examinations for admission will be held in June and September, at the Dental Department. An applicant deficient in either Latin or Physics, or both, may be admitted to the first-year class conditioned in those subjects, but such conditions must be made up during the first year.

COURSE OF INSTRUCTION.

The course of instruction extends through three years of eight months each. The subjects taught during the course are divided as follows:

First Year.	Second Year.	Third Year.
Anatomy.	Organic Chemistry.	Operative Dentistry.
Physiology.	Operative Dentistry.	Orthodontia.
General Chemistry.	Prosthetic Dentistry.	Prosthetic Dentistry.
Histology.	Pathology.	Comparative Dental
Operative Technics.	Materia Medica.	Anatomy.
Prosthetic Technics.	Operative Technics.	Oral Surgery.
Special Anatomy.	Prosthetic Technics.	Orthodontia Technics.
	Infirmity Practice.	Metallurgy.
	Bacteriology.	Prosthetic Technics.
	Dental Histology.	Infirmity Practice.
	Orthodontia Technics.	Dental Therapeutics.
		Dental Pathology.
		Dental Bacteriology.
		Dental Jurisprudence,
		Economics and
		Ethics.

These studies are further described in the following pages.

Hours of recitation, daily from 4.50 p. m. to 10.30 p. m.; 6.30 to 7.30 p. m., dinner hour.

PROSTHETIC DENTISTRY AND ORTHODONTIA.

J. ROLAND WALTON, D.D.S.....Professor
 HERBERT C. HOPKINS, D.D.S.....Instructor in Technics

1. Prosthetic Dentistry. All branches in this department will be under the supervision of the professor. He will deliver the lectures and manage in person and through his assistants the quiz work and course of instruction. This system will prevent confusion in method and technical procedures.

2. Orthodontia. Junior year Orthodontia is a technical course with lectures and demonstrations. The Senior year is a review of the Junior studies with advanced lectures upon the irregularities of the teeth, local and constitutional. Each student is required to make a number of appliances upon models and practically correct cases of irregularity.

OPERATIVE DENTISTRY, DENTAL ANATOMY AND PATHOLOGY.

HENRY C. THOMPSON, D.D.S.....Professor

This course embraces lectures on the special anatomy and physiology of the teeth. The origin, growth, and eruption of the teeth receive minute attention, and are illustrated as their importance demands.

The methods of treating, filling, and extracting teeth receive attention in the lecture-room, and are demonstrated clinically by proficient operators. Extended consideration is given to dental pathology and therapeutics. This chair has personal supervision of the department of Operative Technics.

CHEMISTRY.

CHARLES E. MUNROE, Ph.D.....Professor
 E. G. SEIBERT, M.D.....Associate
 OTIS D. SWETT, M.S.....Instructor

The instruction in this subject embraces:

A short discussion of the principles of Physics in their relation to Chemistry, the principle of chemical philosophy, and the laws of chemical combination.

A study of the elements, metallic and non-metallic; the preparation, properties, and reaction of their different compounds and their application in dentistry; Organic Chemistry, with special attention to those organic compounds that are of practical use; laboratory instruction in the determination of acids and bases, analyses of alloys, etc.

PHYSIOLOGY.

SHEPHERD IVORY FRANZ, Ph.D.	Professor
_____	Instructor
_____	Instructor

This subject is taught in lectures, recitations and laboratory exercises. In the lectures and recitations special emphasis is placed upon those parts of physiology that have a known bearing upon dental medicine and surgery, especially digestion, secretion and the nervous system. Three laboratory periods a week during a semester give the students first-hand knowledge of the principal facts about the general functions of tissues, and the special functions of the nervous system, the special senses, the heart, circulation, digestion, and respiration.

ANATOMY.

W. O. OWEN, M.D.	Professor
J. L. RIGGLES, M.D.	Associate
S. H. GREENE, JR., M.D.	Instructor
E. P. MAGRUDER, M.D.	Instructor
D. T. BIRTWELL, M.D.	Instructor
HENRY I. STOUT, M.D.	Instructor

The instruction in Anatomy is given in a graded course of lectures, recitations from prescribed text-books, and especially by practical work in the dissection of the cadaver. The lectures are illustrated by the use of dry and wet dissections of the cadaver, by models, diagrams, charts, and sciopticon views.

Practical work in osteology and in dissection of the head are of fundamental importance. For the study of these subjects the class is divided into sections in order to make the instruction as practical as possible. The bones of the skeleton are placed in each student's hands, and he is instructed and quizzed upon all their important features.

MATERIA MEDICA AND THERAPEUTICS.

B. M. RANDOLPH, M.D.	Professor
W. B. HOOFNAGLE, D.D.S.	Lecturer on Dental Materia Medica and Therapeutics
NOBLE P. BARNES, M.D.	Lecturer on Materia Medica

Instruction in these subjects embraces:

The study of crude drugs and their preparations and the art of prescribing; the physiological action of drugs in the human system; the practical application of drugs and other therapeutical agencies to the prevention and cure of diseases and the relief of suffering, together with their antidotal relation to poisons.

The subject is taught by means of lectures, recitations, and blackboard illustrations, and is made practical to as great a degree as is compatible with a sufficiently thorough understanding of its principles.

In connection with this chair is a pharmaceutical laboratory, well equipped with modern appliances, in which are taught the making of typical preparations of the Pharmacopœia, prescription writing, and the compounding of prescriptions.

Special attention is given to those drugs that are of most value in the practice of dentistry.

ORAL SURGERY.

CHAS. S. WHITE, M.D. Professor

Instruction in this subject will consist of didactic lectures, recitations, case histories, together with clinics at regular intervals.

The lectures will deal with surgical bacteriology and pathology, surgical technique, anesthesia, wounds, hemorrhage, shock, new growths, constitutional diseases, plastic operations upon the palate and face, dislocation and fracture of the maxillæ. Charts, diagrams, photographs and stereopticon slides will supplement the lectures.

In the clinics at the Emergency Hospital, illustrative cases will be shown. The students will be expected to attend such operations which pertain to this subject.

HISTOLOGY.

HURON W. LAWSON, M.D. Professor

The course in Histology consists in a systematic presentation of the subject of the minute anatomy of the various parts of the body, especial attention being devoted to the histology of the teeth and neighboring structures. The subject is presented partly by systematic lectures, and more especially by the practical study by the individual students of actual specimens under the microscope. The methods of preparation of microscopical specimens are presented and practiced in the laboratory. The projection microscope, affording valuable aid in illustrating and presenting the subject, is constantly used.

PATHOLOGY AND BACTERIOLOGY.

FREDERICK F. RUSSELL, M.D. Professor

C. F. CRAIG, M.D. Associate Professor

H. J. NICHOLS, M.D. Associate

W. R. BRANDENBURG, M.D. Associate

J. S. NEAYE, M.D. Associate

The course begins with a consideration of the principles involved in the process of sterilization by dry and moist heat, the relative value and mode of application of each, and an explanation of the construction of the apparatus employed for the purpose. The use and construction of the thermostat is taken up at the same time and the student taught how he can dispense with these costly appliances in emergencies.

The composition and modes of preparation of the various nutritive media are next considered, working formulas given, and the student required to prepare them at least once in the laboratory. This is followed by a discussion of bacteria as a class, their position in the biological world, their classification, distribution, and the general and special characters that belong to them.

After this preparatory training the various methods in use for the isolation and study of bacteria are taught by practical demonstration and practiced by the students, after which the most important pyrogenic organisms are studied in detail, giving special attention to those found in the nasal and oral cavities.

The aim of the course is chiefly to afford the students an opportunity to become practically familiar with bacteriological working methods, and to enable them to isolate and identify the bacteria present in suppurative processes, as well as to comprehend intelligently the references to micro-organisms in the current professional literature of the day.

PROSTHETIC TECHNICS.

W. FRANCIS LAWRENCE, D.D.S. Associate Professor Senior Year
J. WINSLOW TAYLOR, D.D.S. Instructor Junior Year
HENRY CISSEL YOUNG, D.D.S. Instructor Freshman Year

The technic laboratories are thoroughly equipped for their particular work. The course in prosthetic technics extends through the Freshman, Junior, and Senior years.

The first year is a technical and didactic course. The students are taught the proper equipment of a dental laboratory; the preparation of the mouth for dentures; methods of taking impressions of the mouth and manipulation of the various impression materials; the preparation and mounting of models; selection and artistic arrangement of teeth; the construction of plastic dentures and crowns with general details.

In the Junior class the course is a review of the Freshman year with extended technical and didactic work, embracing a practical course in the swaging of the various metals, as taking impressions, making models and dies, swaging, rimming, attaching teeth by rubber, and in general construction of metal dentures, crown and bridge work.

The Senior year is a practical course, embracing the swaging of plates, teeth attached by soldering, clasps, porcelain work, advanced bridge-

work, removable bridges, and the detailed construction of all work in prosthetic dentistry.

The work of the Department is under the immediate supervision of the associate professor.

METALLURGY.

J. R. DE FARGIS, D.D.S.....Associate Professor

The subject of Metallurgy taught in the chemical laboratory will be reviewed and an extended course will be given in metals, alloys, and amalgams which are used in dentistry.

PROFESSIONAL ETHICS, DENTAL JURISPRUDENCE AND ECONOMICS.

These lectures on ethics consist of a brief statement of the moral obligations of professional men to each other and to their patients and upholding the honor and dignity of the profession, the differences between the profession, business and manufacturing pursuits.

The lectures on jurisprudence will follow the text-book by Dr. Reh fuss, which fully elucidates the legal relation of the dentist to his patients, the importance of dental records, the limitations of dental practice, the liabilities incurred by those who administer anesthetics, the penalties, etc.

Economics.—This course will instruct the student in the proper methods to insure a practice and to retain patients; will discuss business relations between patients and dentists, fees, book and card systems, and the general economy in conducting an office.

THE DENTAL INFIRMARY.

CHARLES BASSETT, D.D.S.....Associate Professor in Charge
J. WINSLOW TAYLOR, D.D.S.....Demonstrator
HENRY CISSEL YOUNG, D.D.S.....Demonstrator
MELVILLE P. ESLIN, D.D.S.....Demonstrator
JAMES N. ROBINSON, D.D.S.....Demonstrator

The Infirmary is open every week day for nine continuous months (being closed during the months of July, August, and September), during which time an abundance of clinical material is readily available. In fact, as many patients present themselves as can possibly be attended to by the students. It is under the immediate supervision of the Demonstrator in charge, who is present from 1 until 6 o'clock each week day.

OPERATIVE TECHNICS.

CADMUS L. ODOR, D.D.S.....Associate Professor
 C. G. SHOEMAKER, D.D.S.....Instructor

This subject is taught by lectures, illustrated by enlarged models and drawings, together with demonstrations of instruments and materials. The students perform exercises in manipulative procedure under the direction of the instructors.

The subjects embraced in the course consist, first, of the study of dental nomenclature, that the student may acquire an understanding of the technical terms used in the course of his dental studies. This is followed by descriptive dental anatomy and the forms and surface markings of each tooth studied, the natural teeth, as well as enlarged models and drawings, being used for the purpose. Each student is required to make various sections of the teeth for the thorough study of the pulp chambers and root canals and their relations to the external surfaces of the teeth.

That tooth-forms may be more perfectly impressed upon the mind of the students, each one is required to carve a tooth of the several classes, as incisor, cuspid, bicuspid, and molar, in bone or artificial ivory, representing the actual form and size of the natural organ. Cavities are classified and illustrated by drawings and models, followed by their preparation and filling in technic forms by the student. Treating and filling root canals is given full attention, the students performing operations of this kind upon natural teeth mounted for the purpose.

All work, in its relation to operative dentistry, is given the necessary consideration to fit the student for meeting, as far as possible, the actual requirements of the infirmary. The operations in the technic department require a large number of natural teeth and a sufficient supply is difficult to obtain.

COMPARATIVE DENTAL ANATOMY.

The senior students will study in this course the food habits and the teeth of animals. The forms of teeth and their uses as weapons of offense and defense will be studied.

CROWN AND BRIDGE WORK, GOLD INLAY, AND PORCELAIN.

ALLEN S. WOLFE, D.D.S.....Associate Professor

Instruction in this course is systematically given by lectures and clinics. The course in technique extends through the Freshman, Junior, and Senior years.

Students are taught the principles and practice of inlay work, porcelain crowns, high and low fusing bodies, the use of the electric and gas furnaces.

ORAL PROPHYLAXIS.

JULIAN GARTRELL, D.D.S.....Lecturer

This subject will be taught didactically and practical work by the students in the treatment of the oral cavity will be required.

TEXT-BOOKS AND WORKS OF REFERENCE.

(The works first named and in *italics* are preferred.)

Anatomy.—*Cunningham's Text-book of Anatomy*; *Cunningham's Manual of Practical Anatomy*; Dental Anatomy, Black's.

Physiology.—Raymond's Human Physiology; Howell's Text-book of Physiology; Tigerstedt's Text-book of Physiology.

Pathology and Bacteriology.—Delafield and Prudden's Pathology; Jordan's Bacteriology.

Chemistry.—*Simon's Chemistry*.

Materia Medica.—*H. C. Wood's Therapeutics*; Hare's Practical Therapeutics; A. A. Stevens' Modern Materia Medica and Therapeutics; Culbreth's Materia Medica and Pharmacy; National Dispensatory Reference Text-books, Osborne, Wilcox, Sollmann, Shoemaker, U. S. Pharmacopoeia and National Formulary; Dental Materia Medica and Therapeutics (Prinz); Modern Dental Materia Medica, Therapeutics, and Pharmacology (Backley); Medical Dictionary (Dorland).

Prosthetic Dentistry.—*The American Text-book of Prosthetic Dentistry*; Esseg's Dental Metallurgy.

Operative Dentistry.—*Harris' Principles of Practice*; Tome's Dental Anatomy and Surgery; Taft's Operative Dentistry; American System of Dentistry (Litch); Kirk's Operative Dentistry; Johnson's Operative Dentistry.

Oral Surgery.—Marshall's Oral Surgery; Grant's Oral Surgery.

Histology.—Nichols, Böhm and Davidoff; Anatomy and Histology of the Mouth, by Bromell.

Orthodontia.—Angle, Treatment of Malocclusion of the Teeth and Fractures of the Maxillæ; Talbot, Irregularities of the Teeth; Jackson, Orthodontia.

Dental Jurisprudence.—Rehfuss.

Dental Pathology and Therapeutics.—Burchard.

Comparative Dental Anatomy.—Thompson.

GRADUATION.

Candidates for graduation must have attended three full courses of lectures, each of eight months' duration, and three courses of clinical instruction in this Department, during the regular winter term and in separate years. Students are examined at the end of the regular course upon all subjects taught them during that course. Should the student fail in his examination in course, he may be reexamined in the fall. All fees must be paid and Infirmary requirements complied with before the student may present himself for examination.

Students must enter before, or within ten days after, the opening lecture of the regular course. They may register at any time during the nine months' Infirmary course, and thus begin Infirmary practice at once upon payment of twenty-five dollars, which amount will be deducted from their tuition fees for the succeeding regular term.

The candidate for graduation must be examined upon all subjects taught in this Department, and before the examination he must perform operations upon the natural organs in the Infirmary, and present the Museum a well-constructed specimen of dental mechanism made by himself in the dental laboratory of the University.

In addition to the above requirements, the moral character and habits of the candidate, his industry, and diligent attendance will be taken into consideration. Notable negligence, immorality, or habitual absence from the lectures will preclude the candidate from attaining his degree, even though he may have acquired sufficient technical knowledge to pass a creditable examination. This reservation on the part of the Faculty of the right to make good moral character a prerequisite for graduation must not be overlooked.

The student also, during and between the sessions, must comply with the State laws regulating the practice of Dentistry, and act in accordance with the recognized code of ethics of the dental profession.

The degrees are conferred by The George Washington University, incorporated by Act of Congress of the United States.

PRIZES.

UNIVERSITY PRIZE.—A prize is given by the University to the graduate passing the best examination in all branches and having the best Infirmary record.

PRIZE AWARDS 1899-10.

The **FIRST PRIZE** for the best record throughout the course of three years is awarded to James Norris Robinson, whose average is 95 per cent.

The J. ROLAND WALTON PRIZE for the best Prosthetician is awarded to Thomas Hoffman.

Honorable mention is made of Raphael Sherfy, Louie Watson Butterfield, and James Norris Robinson.

The HENRY C. THOMPSON PRIZE for the best Operator in the Dental Infirmary is awarded to Melville P. Eslin.

COURSES IN ARTS AND SCIENCES.

Students taking a full course for a degree may be admitted without additional fee, except laboratory fees, to courses for which they are qualified, in the Department of Arts and Sciences, the aggregate of such courses not to exceed six hours per week.

LOCATION.

The Dental Building is No. 1325 H street, N. W. It is within half a square of all lines of street cars going to every part of the city.

The Dean may be seen personally at 702 10th street, N. W., on any week day, and also at the Dental Building, 1325 H street, N. W., on Tuesday and Thursday of each week at 4.30 p. m. during the session.

FEES AND CONTINGENT EXPENSES.

1. Matriculation fee (payable once).....	\$5
2. Annual library fee.....	2
3. Tuition fee per annum, including all charges for materials.....	125
4. Late registration fee in the case of students registering for the first term after October 20, or for the second term after February 20, excepting for courses which do not begin with the terms	2
5. Fee for graduation.....	10
6. Tuition fee per annum for any year repeated once.....	75
In addition to the tuition fees for special or repeated laboratory courses, a charge will be made for materials used.	
7. Fee for a certificate under the seal of the University.....	2
8. Auditors are admitted to lecture courses for the regular tuition fees, but are not permitted to take active part in the work of the classes and will not be allowed credit, in a subsequent course of studies leading to a degree, for attendance as auditors. No matriculation or library fee is charged.	

No change will be made in the fees fixed at registration except in case of withdrawal, and then only upon notice in due form and from the end of the current quarter session when such withdrawals shall be

approved. Applications for the granting of a withdrawal should be made on the prescribed form, to be obtained from the Dean, and will only be received at the end of a quarter session.

Students are furnished microscopes at the following rates:

Microscope for histological laboratory use.....	\$3
Microscope for bacteriological, pathological, and clinical microscopy laboratory use.....	5
Cost of text-books, about.....	30
Cost of instruments, first year.....	20

PAYMENT OF FEES.

All fees are to be paid to the Treasurer. Tuition fees are payable quarterly, in advance. Matriculation, library, and laboratory fees are payable in full, in advance.

BOARD AND ROOMS.

A register of approved boarding-houses is kept by the Treasurer. Accommodations cost from \$25 to \$40 a month.

For catalogues, application blanks and further information, address

THE SECRETARY,
The George Washington University,
Washington, D. C.

PART III.

ASSOCIATED COLLEGES.

National College of Pharmacy.

College of Veterinary Medicine.

Institutions in the District of Columbia organized as corporations under the Charter of the University, having separate financial foundations but educationally forming a part of the system of the University.

TRUSTEES OF THE NATIONAL COLLEGE OF
PHARMACY.

President of the University, *ex-officio* Member of the Board.

1911.

C. B. CAMPBELL, M.D., Phar.D.	LEWIS FLEMER, Phar.D.
HERBERT C. EASTERDAY, Phar.D.	WILLARD S. RICHARDSON, Phar.D.

1912.

FRANK C. HENRY, Phar.D.	H. E. KALUSOWSKI, M.D., Phar.D.
AUGUSTUS C. TAYLOR, Phar.D.	SAMUEL L. HILTON, Phar.D.

1913.

WYMOND H. BRADBURY, Phar.D.	JAMES K. EPPLEY, Phar.D.
SAMUEL WAGGAMAN, M.D.	FRANK P. WELLER, Phar.D.

OFFICERS OF THE BOARD.

H. E. KALUSOWSKI, Chairman.	W. H. BRADBURY, Secretary.
FRANK C. HENRY, Vice-Chairman.	HERBERT C. EASTERDAY, Treasurer.

FACULTY OF THE NATIONAL COLLEGE OF PHARMACY.

CHARLES H. STOCKTON, LL.D.....	ACTING PRESIDENT OF THE UNIVERSITY
HENRY E. KALUSOWSKI, M.D., Phar.D.....	Professor of Pharmacy, Dean
SAMUEL WAGGAMAN, M.D., Phar.D.....	Professor of Materia Medica, Botany and Toxicology.
GEORGE A. MENGE, Ph.D.....	Professor of Chemistry and Physics
HOWARD M. BRADBURY, Phar.D.....	Professor of Analytical Chemistry
BURTON J. HOWARD, B.S.....	Professor of Microscopy
HENRY B. FLOYD, Phar.D.....	Professor of Mercantile Pharmacy
ALEXANDER MUNCASTER, Phar.D., LL.B., LL.M.....	Professor of Pharmaceutical Jurisprudence
LOUIS LAUBINGER, Phar.D.....	Assistant to the Professor of Chemistry
LOUIS B. CASTELL, Phar.D.....	Assistant to the Professor of Chemistry
MELVILLE B. TEWKSURY, Phar.D.....	Assistant to the Professor of Pharmacy

GENERAL STATEMENT.

The National College of Pharmacy, which is the outgrowth of the Columbian Pharmaceutical Association, organized in April, 1871, was chartered under the provisions of an act of Congress in 1872, and opened its doors to students November 11 of that year. In February, 1906, it became a member of the educational system of The George Washington University, under the charter of the University granted by Congress March 3, 1905, providing for the organization of colleges. The President of the University is *ex-officio* president of the National College of Pharmacy, and the College is represented in the President's Council by its Dean.

The work of the College embraces courses in chemistry, botany, materia medica and toxicology, pharmacy and pharmaceutical laboratory work, analytical chemistry, microscopy, mercantile pharmacy, and pharmaceutical jurisprudence. Three years are required for the completion of the prescribed course.

The new College building is centrally located on I street, northwest, between Eighth and Ninth streets. It is easily reached by either of the four principal street car lines of the city.

SPECIAL COURSES.

Students may select one or more of the branches taught and attend the lectures and laboratory work during the time set apart for such study.

Students taking single tickets are not entitled to take the examinations for the degree conferred by the College.

THE DEGREE.

The degree conferred is *Doctor of Pharmacy*.

QUALIFICATIONS FOR THE DEGREE.

1. The student shall have attended three courses of instruction in Chemistry, Pharmacy, Analytical Chemistry, Materia Medica, Botany, and Toxicology; and two in Microscopy, the last of which must have been in this College; and one course each in Mercantile Pharmacy and Pharmaceutical Jurisprudence.
2. He must have passed a satisfactory examination in each of the branches taught.
3. He must be recommended by the Board of Examiners.

MATERIA MEDICA, BOTANY AND TOXICOLOGY.

FRESHMAN COURSE.

The first lectures are introductory to the study of elementary botany, after which follow vegetable histology and plant physiology. The subject-matter of these lectures is thoroughly explained by means of charts, diagrams, and specimens.

JUNIOR COURSE.

This course is devoted to the consideration of the various theories concerning the vegetable world and the practical results obtained by experienced laborers in this science. The lectures are illustrated by means of the lantern and microscope. A large part of the course is devoted to a consideration of the official organic drugs.

SENIOR COURSE.

The lectures are mainly upon the active principles, adulterants, official preparations, therapeutic uses, and doses; after which the organic and inorganic poisons are taken up under three heads: 1st, Corrosive; 2d, Irritant; and 3d, Neurotic Poisons. Under these three divisions are explained briefly their action, detection, and antidote.

PHARMACY.

FRESHMAN COURSE.

This course is given to the study of the various pharmaceutical processes and operations. Following in the order named are lectures on metrology, heat, thermometry, evaporation, distillation, fusion, sublimation, calcination, granulation, comminution, solution, filtration, clarification, decoloration, precipitation, crystallization, and extraction, during which the various methods used to bring about the desired results will be illustrated.

JUNIOR COURSE.

During a part of this course the time is given to the application of the processes considered during the Freshman year to pharmacopœial preparations, and such modifications as adapt them to special uses. This includes methods for making solutions of various substances, extracts, pills, tablets, triturates, compressed tablets, capsules, powders, suppositories, plasters, ointments, cerates, and oleates.

The latter part of this course is taken up with the study of official preparations obtained from the elementary bodies beginning with bromine, chlorine, iodine, phosphorus, and sulphur, followed by carbon, boron, silicon, the inorganic acids, potassium, sodium, lithium, ammonium, magnesium, calcium, barium, zinc, aluminum, cerium, cadmium, manganese, iron, chromium, lead, silver, copper, mercury, antimony, arsenic, bismuth, and gold.

SENIOR COURSE.

The time during this course is mainly given to the study of compounds chiefly derived from organic matter, and products obtained therefrom, amylaceous and saccharine substances; glucosides and alkaloids, volatile oils and animal products commonly used in pharmacy, vegetable oils, soaps, resinoids and products from resins.

ANALYTICAL CHEMISTRY.

The instruction in this Department is intended to present the chemical tests of the United States Pharmacopœia, with methods for the identification of substances and for the detection of impurities; to instruct in the methods of assaying and the use of volumetric solutions, and to enable students to analyze any ordinary mixture of inorganic material.

For the purpose of carrying out the work of this Department a large, well-equipped laboratory is provided with all the usual water and gas facilities, and has recently been wired and installed with electric ap-

paratus whereby electro-chemical methods of analysis can be taught and the application of the electric current to the preparation of chemicals by the methods of electro-chemistry can be illustrated before the students. These and other facilities afford students exceptional opportunities to become familiar with the fundamental principles of the science of chemistry.

The first year is devoted to experimental work so arranged as to supplement the lectures in General Chemistry.

The second year covers a systematic course in qualitative analysis in connection with the tests of the United States Pharmacopœia.

The third year is devoted to volumetric analysis by means of the standard solutions of the Pharmacopœia.

GENERAL CHEMISTRY AND PHYSICS.

Inasmuch as the subjects of Analytical Chemistry and Pharmacy are fully provided for in other courses, these lectures are devoted more closely to the fundamental principles and classification which must underlie a thorough and systematic knowledge of Chemistry. Owing to the intimate connection existing between Chemistry and several branches of Physics, a number of lectures illustrating the more important laws and principles of some of these branches precedes the regular course in Chemistry, and others on these subjects with which a *prior* acquaintance is less important follow after the student has acquired some knowledge of chemical changes. During the first half of the second year Physics and the non-metallic elements receive consideration, followed during the remainder of the second and a portion of the third year by the metals. The greater portion of the third year is devoted to the exposition of the more important facts, principles, and theories of Organic Chemistry.

MICROSCOPY.

The course of Microscopy gives instruction in the use of the compound microscope as an aid in the study and identification of drugs, and requires full attendance from Junior and Senior students.

The work includes both lectures and laboratory courses, and consists in the examination of plant tissue as illustrated in various vegetable substances most familiar to pharmacists. Special attention is given to the structural characteristics by which one drug can be distinguished from another as well as to the detection and identification of the most common adulterants used.

MERCANTILE PHARMACY AND PHARMACEUTICAL JURISPRUDENCE.

These courses are required in the Senior class only.

FEES.

Matriculation	\$5
Tickets for the full year's course of instruction, Freshman or Junior	70
Tickets for the full year's course of instruction, Senior.....	80
Single tickets for Chemistry, Materia Medica, Botany and Toxicology, each.....	15
Single tickets for Analytical Chemistry.....	20
Single tickets for Practical Pharmacy.....	20
Single tickets for Microscopy.....	10
Single tickets for Mercantile Pharmacy.....	5
Single tickets for Pharmaceutical Jurisprudence.....	5
Fee for Diploma.....	10

COLLEGE CALENDAR.

The thirty-eighth annual session of the College will begin on Wednesday, September 21, 1910, and close on Wednesday, June 7, 1911.

Monday.	Tuesday.	Wednesday.
FRESHMEN. Botany. Lectures and Recitations, 10 to 11 a. m.	SENIORS. Microscopy. Lectures and Practice, 6 to 8 p. m.	JUNIORS. Botany and Materia Medica. Lectures and Recitations, 10 to 11 a. m.
Pharmacy. Lectures and Recitations, 11 a. m. to 12 m. Recess, 12 m. to 12.30 p. m.	Mercantile Pharmacy. Oct. 6 to Jan. 26. Lectures and Practice, 8 to 10 p. m.	Pharmacy. Lectures and Recitations, 11 a. m. to 12 m. Recess, 12 m. to 12.30 p. m.
Pharmacy. Laboratory Work, 12.30 to 4 p. m.	Pharmaceutical Jurisprudence. Feb'y 2 to end of Term. 8 to 9 p. m.	Pharmacy. Laboratory Work, 12.30 to 4 p. m.
JUNIORS. Physics and General Chemistry. Lectures and Recitations, 6 to 7 p. m.		FRESHMEN. Physics and General Chemistry. Lectures and Recitations, 6 to 7 p. m.
Analytical Chemistry. Lectures, Recitations, and Laboratory Work, 7 to 11 p. m.		Analytical Chemistry. Lectures, Recitations, and Laboratory Work, 7 to 11 p. m.

Thursday.	Friday.	Saturday.
SENIORS. General and Organic Chemistry. Lectures and Recitations, 6 to 7 p. m. Quantitative Chemical Analysis. Lectures, Laboratory Work, and Recitations, 7 to 11 p. m.	Materia Medica and Toxicology. Lectures and Recitations, 10 to 11 a. m. Pharmacy. Lectures and Recitations, 11 a. m. to 12 m. Recess, 12 m. to 12.30 p. m. Pharmacy. Laboratory Work, 12.30 to 4 p. m. JUNIORS. Microscopy. Lectures, Laboratory Work, and Recitations, 6 to 8 p. m.	

Entrance examination at 1 p. m. on Thursday, September 15, 1910, in the Lecture-room of the College.

Annual examination of Freshmen and Juniors for promotion and of Seniors for graduation begins on Friday, April 28, 1911.

1910—November 24, legal holiday; no College exercises. December 21, last lecture before Christmas vacation.

1911—January 4, lectures resume. February 22, convocation day. June 7, graduation day; College closes.

For further information consult the Dean, Henry E. Kalusowski, 808 I St., N. W.

COLLEGE OF VETERINARY MEDICINE.

BOARD OF TRUSTEES.

J. A. T. HULL.

H. ROZIER DULANY.

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JOHN LOCKWOOD, V.S.

JOHN P. TURNER, V.M.D.

FACULTY.

CHARLES H. STOCKTON, LL.D.....ACTING PRESIDENT OF THE UNIVERSITY

DAVID E. BUCKINGHAM, V.M.D.....Dean, Professor of Materia Medica,
Therapeutics, and Canine Practice

CHARLES E. MUNROE, Ph.D.....Professor of Chemistry

SHEPHERD IVORY FRANZ, Ph.D.....Professor of Physiology

JOHN LOCKWOOD, D.V.S.....Professor of Veterinary Surgery

JOHN P. TURNER, V.M.D.....Professor of Theory and Practice of
Veterinary MedicineROBERT J. FORMAD, V.M.D.....Professor of Comparative Histology
and PathologyADOLPH EICHHORN, D.V.S.....Professor of Contagious Diseases and
Sanitary ScienceALBERT H. HASSEL, M.R.C.V.S.....Professor of Veterinary Zoölogy
and ParasitologyF. F. RUSSELL, M.D., Major U. S. Army, Director Army Medical School,
Professor of Bacteriology and Pathology

T. M. PRICE, M.S., Ph.D.....Professor of Physiological Chemistry

GEORGE H. HART, V.M.D.....Assistant Professor of Sanitary Science
and National QuarantineBENJAMIN T. WOODWARD, V.M.D...Assistant Professor of Zoötechnics,
Milk Hygiene, and Dairy InspectionROSSLYN J. STAFFORD, D.V.M.....Assistant Professor of Veterinary
AnatomyHULBERT YOUNG, V.M.D...Assistant Professor of Veterinary Obstetrics
and Lecturer on Horseshoeing

WILLIAM W. BRIDE, A.B., LL.B...Lecturer on Veterinary Jurisprudence

HERBERT S. WILLIAMS, V.M.D..Lecturer on Military Veterinary Science

JACOB TRAUM, D.V.M.....Demonstrator of Histology and Embryology

TAYLOR O. TIMBERLAKE, Ph.G.....Demonstrator of Veterinary Materia
Medica and Pharmacy

JOHN M. BUCK, D.V.M.....Demonstrator of Veterinary Anatomy

WILLIAM P. COLLINS, D.V.S...Instructor in Clinical Veterinary Surgery

E. H. INCERSOLL.....Assistant in Physiological Chemistry

REQUIREMENTS FOR ADMISSION.

Students presenting a diploma from any recognized college, normal or high school, or a teacher's certificate, are eligible to admission without examination.

Students not having the above qualifications will be required to pass an examination in the common-school branches ordinarily required by the U. S. Civil Service Commission.

ADMISSION OF STUDENTS FROM OTHER SCHOOLS.

Students of other recognized and approved veterinary schools may be admitted to this school as follows:

Those qualified to enter the second year of their own school may be admitted to the second-year class of this school; those qualified to enter the third year of their own school to the third year of this school. Provided, however, that the subjects pursued by the applicants in their previous year or years are reasonably equivalent to those required in the same year or years in this school, and that the requirements for advancement from class to class are the equivalent of those in this school. Applicants may be required to submit to examination in all the subjects pursued by the previous class of this school.

ADVANCED STANDING.

Advanced standing will be given for degrees in Medicine, Dentistry, Veterinary Medicine, or Pharmacy.

Students holding degrees in Arts, Science, Philosophy, or Agriculture, who in the course of study for their degrees have pursued studies in chemistry, physiology, anatomy, histology, bacteriology, or pathology, equivalent to the courses in these subjects in this school, may upon satisfactory evidence of their proficiency be credited with such studies. Provided, however, that such students shall devote two years' study in veterinary medicine, the last year of which is passed in this College.

SPECIAL STUDENTS.

Students, approved by the Dean, not candidates for the degree of Doctor of Veterinary Medicine, may be admitted without examination to pursue any course they may elect. Such courses cannot, however, be subsequently considered as time spent in the course for the degree of Doctor of Veterinary Medicine. Nor can such students enter upon the regular veterinary course without complying with all the regular requirements for admission.

CLASSIFICATION OF STUDENTS.

Students are divided into three classes, according to their proficiency and the time spent, viz., first year, second year, and third year. Students cannot advance to a higher class with more than one major and one minor condition. Students failing in any subject or subjects may be permitted at the next examination period a reëxamination in the subjects in which they fail. The Faculty may dismiss any student from the school, if in its judgment such student be deemed an unsuitable person, intellectually or otherwise, for the profession of veterinary medicine.

ORDER OF INSTRUCTION.

The subjects studied in each year are shown in the following table:

First Year.	Second Year.	Third Year.
Anatomy.	Bacteriology.	Practice.
Histology.	Pathology.	Surgery.
General Chemistry.	Physiology.	Obstetrics.
Materia Medica.	Canine Med.	Therapeutics.
Horseshoeing.	Surgery.	Meat Hygiene.
Pharmacy.	Practice.	Veterinary Jurisprudence.
	Clinics.	Clinics.
	Zoötechnics.	Parasitology.
	Bio-Chemistry.	Milk Hygiene.

For lecture, laboratory and dissecting hours a schedule card is furnished.

Examinations are held at the end of each course. Clinical work in the veterinary and canine hospitals connected with the College and at abattoirs and stock and dairy farms is required of second and third year students.

ANATOMY.

ROSSLYN J. STAFFORD, D.V.M.....Professor of Veterinary Anatomy
JOHN M. BUCK, D.V.M.....Demonstrator of Anatomy

The instruction in Anatomy is given in a series of lectures, demonstrations, recitations, and laboratory work, the latter being the most important.

The lectures are intended to present the general anatomical features of the horse and other domestic animals, and to point out the anatomical relations of the organs and parts of the body most subject to surgical operations.

The horse is used as the type subject in dissection, and every student is required to dissect all the parts of the horse, and such other of the domesticated animals, including the ox, sheep, swine, dog, and cat, as may prove most expedient.

The laboratory is well supplied with all of the parts of the skeleton of the horse, and portions of the skeleton of various other domestic animals, for the work in osteology. Ample material is always available for the dissection of joints, muscles, viscera, and the vascular and nervous systems. The laboratory is also provided with a complete model of the horse, showing the relation of all the organs and parts of the body, for demonstrations in general and surgical anatomy. The course is completed in the first year.

TEXT-BOOK: Chauveau's Comparative Anatomy of the Domesticated Animals.

HISTOLOGY AND EMBRYOLOGY.

ROBERT J. FORMAD, V.M.D., M.D.... Professor of Comparative Histology and Embryology

JACOB TRAUM, D.V.M..... Demonstrator of Histology and Embryology

These subjects are taught by a series of carefully correlated lectures, recitations, quizzes, and demonstrations, occupying five hours each week during the first half of the year, and will include such instruction in microscopy as a working knowledge of the use of the simple and compound microscope and accessories, supplemented by the fundamental laws of optics; the method of preparing tissues for microscopic examination, and the technique of mounting.

Comparative histology will deal with the minute structure of the tissues and organs of various animals, including man. In addition to the microscopical demonstrations, lantern demonstrations will also be given.

Embryology under this head will present the salient features of the anatomy and physiology of the fecundated ovule up to the time of birth.

TEXT-BOOK: Histology, Böhm, Davidoff & Huber.

PHYSIOLOGY.

SHEPHERD IVORY FRANZ, Ph.D..... Professor of Physiology

The course in Physiology consists of lectures, demonstrations, and laboratory exercises. The lectures cover all the important facts and theories regarding bodily functions of the animal, and are illustrated by diagrams, models, and prepared specimens.

In the laboratory each student performs a number of experiments on blood, on the circulation, on digestion, on the general functions of nerves and muscles, and on the special senses of animals.

Special emphasis is laid on the relation of normal physiological functions to the disturbances of function in disease and upon the physiological action of drugs.

It is intended in this way to bring the work of the Physiological Laboratory and other exercises into closer relation with the succeeding course in Pathology, Therapeutics, and General Veterinary Medicine.

TEXT-BOOKS: Howell's Physiology, Smith's Veterinary Physiology.

CHEMISTRY.

(First Year.)

General Chemistry.—A series of illustrated lectures, accompanied by recitations and exercises, on theoretical, inorganic, organic, and technical Chemistry. The student is required to take notes on these lectures, which he must submit for examination. *Tuesdays, Thursdays, and Saturdays*, at 4.50. Professor MUNROE and Mr. SWETT.

Laboratory Practice.—A laboratory course for the study of the principles of chemistry which is designed to instruct students in the methods of conducting chemical experiments. *Tuesdays and Thursdays*, at 1.30 or 7. Professor MUNROE and Assistant Professor HILL.

TEXT-BOOKS: Holland's Medical Chemistry and Toxicology.

PHYSIOLOGICAL CHEMISTRY.

(Second Year.)

T. M. PRICE, M.S., Ph.D.....Professor of Physiological Chemistry
E. H. INGERSOLL.....Assistant

This course will consist of lectures and laboratory instruction, and includes the study of water from a sanitary standpoint; the chemical examination of milk, the tissues and fluids of the body; the isolation of the digestive enzymes, and a study of their action in vitro.

MATERIA MEDICA AND THERAPEUTICS.

DAVID E. BUCKINGHAM, V.M.D.....Professor of Veterinary
Materia Medica and Therapeutics
TAYLOR O. TIMBERLAKE, Ph.G.....Demonstrator of Veterinary
Materia Medica and Pharmacy

First year. (1) Lectures upon and demonstrations of drugs and their preparations and doses used in veterinary practice will be followed

by recitations to assist in memorizing. (2) Practical exercises will be given in prescription writing, also a short course in Veterinary Pharmacology.

Third year. (1) Systematic lectures upon the physiological action of drugs and their effects in disease, their therapeutic uses, and their methods of administration to animals. (2) Prescription writing, in which students are given hypothetical cases for which to prescribe. (3) The therapeutic application of various agencies not drugs.

TEXT-BOOK: Winslow's Veterinary Materia Medica and Therapeutics.

PRACTICE OF VETERINARY MEDICINE.

JOHN P. TURNER, V.M.D.....Professor of Veterinary Medicine

This subject is taught by a series of lectures, recitations, quizzes, and clinics extending over a period of two years.

The student is personally drilled in all the various diseases and doctrines taught in a well regulated veterinary school.

Especial attention is given to practical work whereby the student can become proficient in the diagnosis and treatment of disease.

Visits are required to the three veterinary hospitals in connection with the University, and personal attention is given students in visits to various large stables in and adjacent to the city of Washington, where practical instruction is given the second and third year classes in physical diagnosis among horses, cows, and hogs.

Equal attention is given diseases of cattle as of horses, whereby the student is properly fitted for either city or country practice.

Diseases of food-producing animals will be thoroughly explained.

TEXT-BOOKS: Friedberger and Froehner's Pathology and Therapeutics of Domestic Animals; Robertson's Practice of Equine Medicine; Williams' Principles and Practice of Veterinary Medicine; Fleming's Manual of Veterinary Sanitary Science and Police; Glass' translation of Müller's Diseases of the Dog.

VETERINARY SURGERY.

JOHN LOCKWOOD, V.S.....Professor of Veterinary Surgery
WM. P. COLLINS, D.V.S.....Instructor in Clinical Veterinary Surgery

The instruction given in this course embraces systematic lectures upon the principles and practice of Veterinary Surgery.

The different surgical operations are illustrated in clinic and upon the cadaver and the uses of all the important surgical instruments and appliances are demonstrated in the same manner. The use of anaesthetics, the practice of dental surgery and castration on all domestic animals will receive special attention.

TEXT-BOOKS: Moeller's Operative Veterinary Surgery; Fleming's Operative Veterinary Surgery; Hobday's Canine and Feline Surgery; Williams' Principles and Practice of Veterinary Surgery; Pfeiffer and Williams' Surgical Operations.

BACTERIOLOGY AND PATHOLOGY.

F. F. RUSSELL, M.D.....Professor of Bacteriology and Pathology
(Curator Army Medical Museum.)

Bacteriology.—This subject comprises laboratory instruction in the fundamental principles and methods of pure bacteriology. Thorough drilling is given in the preparation of culture media, in disinfection, sterilization, staining, and the general methods of bacterial differentiation. Following this course, which is given daily during October, the further study of bacteria is taken up in connection with and as applied to pathology.

Pathology comprises the laboratory study of the general and special phenomena of inflammation, and a detailed study of the pathological processes found in the various diseases. The relation of bacterial and other microphytic life to disease processes and results is studied coincidentally and constitutes a course in applied bacteriology. In connection with the laboratory work a course of lectures and demonstrations is given upon immunity, serum therapy, and protective inoculation.

Surgical Pathology.—A special course in the healing of wounds and injuries and in the pathology of surgical operations is given in the third year.

Clinical Microscopy, comprising the study of the various tissues, fluids, ejecta, and dejecta, with a view to diagnosis of diseased conditions, is given in the first part of the third year.

TEXT-BOOK: Abbott's Principles of Bacteriology, Delafield and Prudden's Pathology.

CONTAGIOUS DISEASES AND SANITARY SCIENCE.

ADOLPH EICHORN, D.V.S.....Professor of Contagious Diseases
and Sanitary Science
GEORGE H. HART, M.D., V.M.D.....Assistant Professor of Sanitary
Science and National Quarantine

The lectures in this course will be given with reference to the etiology, pathogenesis, symptoms, diagnosis, treatment, and prevention of the contagious diseases. Local and national regulations and measures governing the control and eradication of diseases, with particular reference to the work of the United States Government in the eradication of contagious diseases, will be clearly explained.

TEXT-BOOKS: Moore's *The Pathology of Infectious Diseases of Animals*; Friedberger and Frochner's *Pathology and Therapeutics of Domestic Animals*.

ZOÖTECHNICS AND MILK HYGIENE.

B. T. WOODWARD, V.M.D.....Assistant Professor of Milk Hygiene
and Zoötechnics

The course covers the chief phases of live-stock work, including the judging, breeding, feeding, and management of horses, cattle, sheep, and swine.

It is introduced by discussions upon the origin of animal life, natural selections, the origin of breeds, and the domestication of animals.

The principles of breeding, heredity, environment, selection, individual conformation, the history and development of breeds, principles of animal nutrition, balanced rations, practical feeding, and the economic production of beef, milk, mutton, and pork are given consideration.

Students obtain practical experience in the judging of the various breeds and classes of animals by visits to neighboring farms.

The course in Milk Hygiene will be given by lectures and demonstrations throughout the third year. The students will be taught the theory of milk secretion, the composition and characteristics of milk, the various methods of testing, together with the chemistry and bacteriology of milk, abnormal forms of milk, and diseases transmissible through milk to bovines and humans, with a study of the epidemics produced. Sanitary stabling and the sanitary handling of milk will be considered, showing the construction of various types of dairy barns and dairy houses, the manner of milking, care of the milk, and the varieties and care of dairy utensils; also a study of sterilization and pasteurization.

TEXT-BOOKS: Plumbs, *Types and Breeds of Farm Animals*; Pearson's translation Jensen's *Essentials of Milk Hygiene*.

VETERINARY ZOÖLOGY AND PARASITOLOGY.

ALBERT H. HASSELL, M.R.C.V.S.....Professor of Veterinary Zoölogy

This course will embrace Zoölogy and the various parasites with which the various domestic animals are infested. Instruction as to prevention, eradication, and the treatment of the diseases caused by them will be given.

TEXT-BOOK: Neuman, *Animal Parasites*.

VETERINARY OBSTETRICS.

HULBERT YOUNG, V.M.D...Assistant Professor of Veterinary Obstetrics

The course of instruction will consist of lectures on obstetrical anatomy, foetal development, presentations, and the diseases incidental to the periods of gestation and parturition.

The lectures will be illustrated by diagrams, models, natural preparations, and other appliances for demonstrating the principles taught.

TEXT-BOOK: Fleming, Dalrymple.

HORSESHOEING.

HULBERT YOUNG, V.M.D.....Lecturer on Horseshoeing

The course is intended to familiarize students with the principles of shoeing, the examination of the feet and proper use of special shoes for relief of defects or disease.

TEXT-BOOK: Lungwitz on Horseshoeing, Adams' translation.

MILITARY PRACTICE.

HERBERT S. WILLIAMS, V.M.D...Lecturer on Veterinary Military Practice
(U. S. Army, Fort Myer, Va.)

This course consists of lectures and demonstrations of purely military veterinary subjects, and is given at Fort Myer, Va., the cavalry and artillery post near Washington, D. C.

The subjects of saddling, biting, and draft, together with the study of the proper conformation of animals used for military purposes, are included in this set of lectures.

The control of animal epidemics in military life is also given special consideration.

VETERINARY JURISPRUDENCE.

WILLIAM W. BRIDE, A.B., LL.B...Lecturer on Veterinary Jurisprudence

A series of lectures upon the Law of Animals, including suggestions relating to the conduct of veterinarians as experts in the trial of cases involving the above law.

In addition to the foregoing courses of lectures, a number of Government experts have been engaged to give lectures on subjects of special interest to the veterinarian.

These men are specialists in their lines of scientific research, and this is the only school giving such a course.

EXAMINATIONS AND DEGREE.

Examinations are held at the end of the course in each subject. Students failing in examinations will be permitted to be reexamined at the next regular examination period. Students will not be admitted to examination unless they have paid all fees due at the time or present a permit signed by the Dean. In order to avail themselves of the privilege of reexamination, students must file their written applications with the Dean not later than fifteen days before the date set for the examinations.

Proficiency is marked upon a scale of 100. A grade of 70 is required to pass an examination.

If a satisfactory examination is passed, the student receives the Degree of Doctor of Veterinary Medicine (D.V.M.).

THE VETERINARY LIBRARY.

This library is located in the Administration Building of the College of Veterinary Medicine, and is open from 8 a. m. to 10 p. m.

It contains, in addition to volumes on veterinary medical subjects, the current veterinary journals.

Provision is made in the annual library fee charged every student to add to it as published the important new works on veterinary medicine.

OTHER LIBRARIES.

Washington contains the Library of the Surgeon General's Office of the United States Army, the most complete medical library in the world. This library, as all other libraries of the Government, is open to the public between the hours of 9 a. m. and 4.30 p. m. There is also the Library of Congress and the many excellent libraries of the various other Government offices, in addition to the University Medical Library.

FEES AND CONTINGENT EXPENSES.

1. Matriculation fee (payable only on first entry into the University)	\$5
2. Library fee per annum.....	2
3. Tuition fee per annum.....	100
4. Fee for graduation.....	10

A deposit of \$5 per annum is required of every student to cover loss, breakage, or damage to the property of the school. The amount of such deposit paid in excess of the breakage will be returned.

No change will be made in the fees fixed at registration except in case of withdrawal, and then only upon notice in due form, and from the end

of the current quarter-session, when such withdrawal shall be approved. Applications for the granting of a withdrawal should be made on the prescribed form to be obtained from the Secretary, and will be received only at the end of a quarter-session.

Students are urged to purchase their own microscopes, but those who do not care to do so may rent them from the University at the following rates:

Microscope for Histological Laboratory use.....	\$3
Microscope for Bacteriological, Pathological, and Clinical Microscopy Laboratory use.....	5

PAYMENT OF FEES.

All fees are to be paid to the clerk. Tuition fees are payable quarterly, in advance. Matriculation, library, and laboratory fees are payable in full, in advance.

BOARD AND ROOMS.

A register of approved boarding-houses is kept by the clerk. Accommodations cost from \$25 to \$40 a month.

For further information apply to

DAVID E. BUCKINGHAM, *Dean,*
The George Washington University,
College of Veterinary Medicine,
Washington, D. C.

Nos. 2113-2115 Fourteenth St., N. W.

PART IV.
STUDENTS IN THE UNIVERSITY.

DEGREES CONFERRED, MISCELLANEA.

Students in the University.

DEPARTMENT OF ARTS AND SCIENCES.

GRADUATE STUDIES.

In Attendance.

Name.	Legal residence.	City address.
Bolger, William Augustine.....	Mich.....	Holy Cross College, Brookland, D. C.
Ph.B., 1907, University of Notre Dame. Topic—Economics.		
Cash, Lillian Claire.....	N. Y.....	126 Tenn. Ave., N. E.
B.A., 1909, The George Washington University. Topic—Chemistry.		
Caskey, Gardner Lemmon.....	D. C.....	C/o Navy Department.
Graduate, 1906, United States Naval Academy. Topic—Chemistry.		
Clark, Burton William.....	N. Y.....	1771 T Street, N. W.
B.S., 1907, M.S., 1908, Syracuse University. Topic—Geology.		
Des Jardins, Clarence Bigelow....	Mich.....	1406 11th Street, N. W.
B.A., 1909, Kalamazoo College. Topic—Chemistry.		
Martin, Julia.....	Mich.....	1538 Girard Street, N. W.
B.S., 1909, Columbia University. Topics—Psychology, Education.		
Ogden, Richard Leslie.....	Pa.....	816 18th Street, N. W.
A.C., 1894, Lehigh University. Topic—Chemistry.		
Rubira, Carlos H.....	Ecuador...	739 13th Street, N. W.
B.A., 1895, National College of Ecuador. Topic—Chemistry.		
Schuyler, Garret Lansing.....	D. C.....	C/o Navy Department.
Graduate, 1906, United States Naval Academy. Topic—Chemistry.		
Stearns, Stella Burger.....	Minn.....	Forest Glen, Md.
M.A., 1906, Columbia University. Topic—Psychology.		

Doctor of Civil Law.

Miller, Clarence Alphonso.....	Mo.....	Matamoras, Mexico.
L.L.B., 1899, Kansas City School of Law. L.L.M., 1905, M. Dip., 1906, The George Washington University.		

Civil Engineer.

Name.	Legal residence.	City address.
Adams, Raymond Edmond.....	Pa.	707 22d Street, N. W.
B.S. in C. E., 1909, The George Washington University.		
Lawrence, Glenn Rupert.....	D. C.	3425 14th Street, Brook- land, D. C.
B.S. in C.E., 1910, The George Washington University.		

Electrical Engineer.

Honn, Harlan Verne.....	D. C.	400 8th Street, N. E.
B.S. in E.E., 1909, The George Washington University.		
Marquis, Sydney.....	S. Dak.	116 3d Street, N. E.
B.S., 1909, South Dakota State College.		

Master of Science.

Allen, Edward Riley.....	Ill.	Dept. of Agriculture.
B.S.A., 1906, University of Illinois.		
<i>Topics</i> —Major, Chemistry; Minors, Physics, Mathematics.		
Macmillan, Julia Theckla.....	D. C.	600 Maryland Ave., N. E.
B.S., 1907, The George Washington University.		
<i>Topics</i> —Major, Zoölogy; Minors, Zoölogy, English.		
Morse, Bryan Woodward.....	N. Y.	2138 G Street, N. W.
B.S., 1909, Thomas S. Clarkson Memorial School of Technology.		
<i>Topics</i> —Major, Electrical Engineering; Minors, Political Science, Commerce.		
Smith, Delos Hamilton.....	Ariz.	1905 F Street, N. W.
B.S. in Arch., 1906, The George Washington University.		
<i>Topics</i> —Major, Architecture; Minor, Architecture.		
Stack, Ervin Blakeney.....	N. C.	Monroe, N. C.
B. Eng., 1905, North Carolina Agricultural and Mechanical College.		
<i>Topics</i> —Major, Physics; Minors, Chemistry, Mathematics.		
Sterrett, John Adlum.....	D. C.	Springland, Pierce Mill Road, D. C.
B.S., 1908, The George Washington University.		
<i>Topics</i> —Electrical Engineering; Minors, Philosophy, Mathematics.		
Streeter, Daniel Denison.....	N. Y.	U. S. Biological Survey.
B.S., 1909, Columbia University.		
<i>Topics</i> —Major, Zoölogy; Minors, Anatomy (Zoölogy), Chemistry.		

Master of Arts.

Baker, Mary Gertrude.....	Ga.	311 C Street.
B.S., 1909, Ohio Northern University.		
<i>Topics</i> —Major, English; Minors, Philosophy, History.		
Barbour, Alice Mand.....	Conn.	1834 Jefferson Place.
B.S., 1893, Wellesley College.		
<i>Topics</i> —Major, English; Minors, English, Sociology.		

STUDENTS IN THE UNIVERSITY.

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Name.	Legal residence.	City address.
Bowker, Charles Harvey.....	N. H.....	1310 Vermont Ave.
M.D., 1892, Hahnemann Medical College.		
M.D., 1900, National University.		
A.B., 1909, The George Washington University.		
Topics—Major, Bacteriology; Minors, Pathology, Zoölogy.		
Bradshaw, May Paul.....	D. C.....	901 C Street, N. E.
A.B., 1909, The George Washington University.		
Topics—Major, History; Minors, English, Education.		
Brookes, John St. Clair, Jr.....	D. C.....	1525 Corcoran Street.
A.B., 1907, The George Washington University.		
Topics—Major, English; Minor, Latin.		
Cullom, Edward.....	Tenn.....	2023 I Street.
B.A., 1904, University of Nashville.		
Topics—Major, French; Minors, English, History.		
Drummond, Mary Walter.....	D. C.....	1262 Columbia Road.
A.B., 1905, Woman's College of Baltimore.		
Topics—Major, Education; Minors, Psychology, Latin.		
Frost, Wesley.....	Ky.....	1117 17th Street.
A.B., 1907, Oberlin College.		
Topics—Major, Economics; Minors, International Law, History.		
Hamm, Theodore Cushing.....	Calif.....	1408 Monroe Street.
B.A., 1904, University of Colorado.		
Topics—Major, Political Science; Minors, Economics, History.		
Hare, Butler Black.....	S. C.....	1829 F Street, N. W.
A.B., 1899, Newberry College.		
Topics—Major, History; Minors, Economics, Political Science.		
Hatton, Stewart P.....	W. Va.....	The Ardmore.
A.B., 1890, Ped. B., 1891, University of Missouri.		
A.M., 1893, McGee College.		
LL.D., 1904, La Mars College.		
Topics—Major, Education; Minors, Philosophy, Psychology.		
Hopson, Howard Colwell.....	Wis.....	Public Service Commission, Albany, N. Y.
A.B., 1908, The George Washington University.		
Topics—Major, Political Science; Minors, Economics, History.		
Lincoln, Carl Otto.....	Kans.....	3423 Brown Street.
A.B., 1909, Bethany College.		
Topics—Major, Economics; Minors, History, Political Science.		
Lowe, Henry Francis.....	D. C.....	215 5th Street, N. E.
LL.B., 1890, College of William and Mary.		
B.S., 1903, The George Washington University.		
Topics—Major, Psychology; Minors, Education, Political Science.		
McAvoy, Catharine Agatha.....	D. C.....	1917 17th Street.
A.B., 1908, The George Washington University.		
Topics—Major, Latin; Minors, French, German.		
McKenna, Coe Aloysius.....	Oregon.....	1500 Columbia Road.
B.A., 1910, The George Washington University.		
Topics—Major, Economics; Minors, Political Science, History.		

Name.	Legal residence.	City address.
Plass, Joseph.....	Germany.....	225 H Street.
A.B., 1910, The George Washington University.		
<i>Topics</i> —Major, History; Minors, Archæology, English.		
Pollock, William McCally.....	W. Va.....	2102 Flagler Street.
A.B., 1898, University of West Virginia.		
<i>Topics</i> —Major, Chemistry; Minors, Physiology, Bacteriology.		
Rankin, John Owen.....	D. C.....	610 22d Street.
A.B., 1904, Tarkio College.		
<i>Topics</i> —Major, Economics; Minors, Political Science, International Law and Diplomacy.		
Samson, René Jean Marie.....	D. C.....	Central High School.
<i>Topics</i> —Major, Psychology; Minors, Education, English.		
Seiler, Justin Frank.....	Ohio.....	Amer. Univ. Park.
B.A., 1908, The George Washington University.		
<i>Topics</i> —Major, History; Minors, History, English.		
Watkins, Rhoda.....	Pa.....	1412 14th Street.
A.B., 1906, The George Washington University.		
<i>Topics</i> —Major, English; Minors, German, English.		
White, Emilie Margaret.....	D. C.....	2568 University Place.
A. B., 1907, The George Washington University.		
<i>Topics</i> —Major, German; Minor, History.		
Wolfe, Bertha Frances.....	Ind.....	621 19th Street.
A.B., 1884, Southern Indiana Normal College.		
<i>Topics</i> —Major, English; Minors, History, Philosophy.		

Doctor of Jurisprudence.

Willard, Charles Franklin.....	Mass.....	1333 Fairmont Street.
B.S. in M.E., 1901, B.S. in Naval Architecture, 1902, Massachusetts Institute of Technology.		
J.B., 1906, J.M., 1907, Boston University Law School.		
M.P.L., 1909, The George Washington University.		
<i>Topics</i> —Major, Corporations; Minors, Constitutional Law, Corporation Finance.		

Doctor of Philosophy.

Alden, Levi Russell.....	D. C.....	Union Trust Bldg.
B.A., 1903, M.A., 1904, Columbian University.		
<i>Topics</i> —Major, History; Minors, Law, History.		
Betts, Philander.....	N. J.....	The Oakland.
B.S., 1891, M.S., 1895, Rutgers College.		
E.E., 1903, Columbian University.		
<i>Topics</i> —Major, Electrical Engineering; Minors, Economics, Mathematics.		
Church, Calvin Grant.....	Md.....	111 12th Street, S. E.
B.S., 1900, Maryland Agricultural College.		
M.S., 1902, Columbian University.		
<i>Topics</i> —Major, Chemistry; Minor, Chemistry.		
Churchill, George Morton.....	Mass.....	Library of Congress.
A.B., 1896, Boston University.		
A. M., 1909, The George Washington University.		
<i>Topics</i> —Major, History; Minors, Economics, History.		

STUDENTS IN THE UNIVERSITY.

207

Name.	Legal residence.	City address.
Clark, Marion.....	Md.....	1330 Vermont Ave.
B.A., 1901, M.A., 1903, Western Maryland College.		
<i>Topics</i> —Major, History; Minors, Law, Political Science.		
Coffey, George Nelson.....	N. C.....	Bureau of Soils.
Ph. B., 1900, University of North Carolina.		
M.S., 1908, The George Washington University.		
<i>Topics</i> —Major, Geology; Minors, Mineralogy, Meteorology.		
Colton, Molton Avery.....	Md.....	U. S. Naval Academy.
A.B., 1898, Yale University.		
<i>Topics</i> —Major, Romance Languages; Minors, French, International Law and Diplomacy.		
Custis, Horace Hatch.....	D. C.....	912 15th Street.
A.B., 1906, Johns Hopkins University.		
M.A., 1908, The George Washington University.		
<i>Topics</i> —Major, Chemistry; Minors, Geology, Bacteriology.		
Edler, August Fr. Wilhelm.....	Germany.....	2636 Woodley Place.
B.A., 1906, M.A., 1907, M.Dip., 1908, The George Washington University.		
<i>Topics</i> —Major, International Law and Diplomacy; Minors, Political Science, History.		
Frost, Wesley.....	Ky.....	1117 17th Street.
A.B., 1907, Oberlin College.		
<i>Topics</i> —Major, Economics; Minors, International Law, History.		
Gardner, James Henry.....	Ky.....	Geological Survey.
B.S., 1900, M.S., 1906, Kentucky State College.		
<i>Topics</i> —Major, Geology; Minors, Geology, Zoölogy.		
Gordon, Hayner Haskell.....	Ohio.....	1310 Girard Street.
B.S. in E.E., 1908, E.E., 1909, The George Washington University.		
<i>Topics</i> —Major, Physics; Minors, Mathematics, Engineering.		
Hall, Percival.....	D. C.....	Kendall Green.
A.B., 1892, Harvard University.		
M.A., 1893, Gallaudet College.		
M.A., 1898, Columbian University.		
<i>Topics</i> —Major, Mathematics; Minors, Applied Mathematics, Astronomy.		
Huddle, John Thomas.....	D. C.....	738 11th Street.
A.B., 1891, A.M., 1896, Roanoke College.		
<i>Topics</i> —Major, Psychology; Minors, Philosophy, English.		
Jenkins, Minnie.....	N. Y.....	1320 I Street.
B.S.A., 1907, M.S.A., 1896, Roanoke College.		
<i>Topics</i> —Major, Bacteriology; Minor, Chemistry.		
Kibler, Alton Lewin.....	Va.....	University of Berlin.
A.B., 1904, Randolph-Macon College.		
M.S., 1909, The George Washington University.		
<i>Topics</i> —Major, Chemistry; Minors, Chemistry, Bacteriology.		
In Absentia.		
Kibler, Thomas Latimer.....	Va.....	University of Berlin.
A.B., 1904, Randolph-Macon College.		
M.A., 1908, The George Washington University.		
<i>Topics</i> —Major, Economics; Minors, History, Sociology.		
In Absentia.		

Name.	Legal residence.	City address.
Kimball, Herbert Harvey.....	N. H.....	Library, U. S. Weather Bureau.
B.S., 1884, New Hampshire College of Agriculture and Mechanic Arts.		
M.S., 1900, Columbia University.		
<i>Topics</i> —Major, Astro-Physics; Minor, Meteorology.		
Lewis, Howard Bishop.....	Conn.....	1410 M Street.
B.A., 1908, Yale University.		
<i>Topics</i> —Major, Chemistry; Minors, Bacteriology, Physics.		
Lincoln, Carl Otto.....	Kans.....	3423 Brown Street.
A.B., 1909, Bethany College.		
<i>Topics</i> —Major, Economics; Minors, History, Political Science.		
Lotka, Alfred James.....	D. C.....	Patent Office.
B.Sc., 1901, Birmingham University, England.		
M.A., 1909, Cornell University.		
<i>Topics</i> —Major, Applied Mathematics; Minors, Physics, Chemistry.		
Lyon, Marcus Ward, Jr.....	N. J.....	National Museum.
Ph. B., 1897, Brown University.		
M.S., 1900, M.D., 1902, Columbia University.		
<i>Topics</i> —Major, Zoölogy; Minors, Neurology, Histology.		
McBryde, Charles Neil.....	Va.....	The Iroquois.
B.S., 1891, University of South Carolina.		
M.S., 1893, The Virginia Polytechnic Institute.		
M.D., 1897, The Johns Hopkins University.		
<i>Topics</i> —Major, Preventative Medicine; Minors, Botany, Geology.		
Mattern, Louis Wilson.....	Pa.....	The McKinley Manuel Training School.
B.S., 1894, Pennsylvania State College.		
<i>Topics</i> —Major, Chemistry; Minor, Chemistry.		
Mills, Joseph Strayer.....	Md.....	High School of Commerce, N. Y. City.
B.A., 1890, M.A., 1893, Western Maryland College.		
<i>Topics</i> —Major, Chemistry; Minors, Mineralogy, Physics.		
Newberne, Robert Edward Lee...	Texas.....	Bureau of Health, Interior Department, Philippine Islands.
M.D., 1893, Georgetown University.		
D.D.S., 1898, Tacoma College Dental Surgery.		
B.S., 1901, M.S., 1901, Columbia University.		
<i>Topics</i> —Major, Neurology; Minors, Anatomy, Physiology.		
Nin-Frias, Albert.....	Uruguay...	2117 California Ave.
B.A.S., 1907, Montevideo University.		
M.A., 1909, The George Washington University.		
<i>Topics</i> —Major, Sociology; Minors, Philosophy, English.		
Orth, Henry, Jr.....	D. C.....	1011 L Street.
M.E., 1893, Lehigh University.		
M.S., 1899, Columbia University.		
<i>Topics</i> —Major, Chemistry; Minor, Chemistry.		
Paine, Howard Shepard.....	Ohio.....	2514 13th Street, N. W.
A.B., 1902, Ohio University.		
<i>Topics</i> —Major, Chemistry; Minors, Chemistry, Physics.		

STUDENTS IN THE UNIVERSITY.

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Name.	Legal residence.	City address.
Patrick, George Edward.....	Iowa.....	Dept. of Agriculture.
B.S., 1893, M.S., 1894, Cornell University.		
Topics—Major, Chemistry; Minors, Bacteriology, Chemistry.		
Portner, Edward George.....	Va.....	Alexandria, Va.
B.S., 1897, M.S., 1898, Columbia University.		
Topics—Major, Chemistry; Minor, Chemistry.		
Ross, George Albert.....	Mo.....	2518 13th Street.
A.B., 1893, William Jewell College.		
M.A., 1898, Columbia University.		
Topics—Major, Mathematics; Minors, Education, Applied Mathematics.		
Schoenfeld, Hans Fred'k Arthur....	D. C.....	3448 34th Place, Cleveland Park, D. C.
A.B., 1907, A.M., 1909, The George Washington University.		
Topics—Major, History; Minors, History, International Law.		
Shepherd, William Thomas.....	Ark.....	511 G Street.
B.Sc., 1899, Ph.D., 1901, Gale College.		
M.A., 1905, M.S., 1906, Oklahoma State University.		
Topics—Major, Psychology; Minors, Education, Psychology.		
Smith, John William.....	D. C.....	125 11th Street, N. E.
A.B., 1901, Randolph-Macon College.		
Topics—Major, Philosophy; Minors, Philosophy, Semitics.		
Solyom, Herbert Louis.....	Md.....	U. S. Patent Office.
B.S., 1902, M.S., 1903, Columbia University.		
Topics—Major, Philosophy; Minor, Meteorology.		
Streeter, Daniel Demison.....	N. Y.....	U. S. Biological Survey.
B.S., 1909, Columbia University.		
Topics—Major, Zoölogy; Minors, Anatomy (Zoölogy), Chemistry.		
Swett, Otis Dow.....	Md.....	Chevy Chase, Md.
LL.B., 1891, LL.M., 1892, B.A., 1904, Columbia University.		
M.S., 1909, The George Washington University.		
Topics—Major, Chemistry; Minors, Chemistry, Bacteriology.		
Townsend, Chas. Henry Tyler....	D. C.....	
B.S., 1908, The George Washington University.		
Topics—Major, Zoölogy; Minors, Geology, Botany.		
Wilkinson, Oscar.....	Miss.....	1404 L Street.
M.D., 1896, Tulane University.		
Ph.B., 1902, University of Mississippi.		
M.A., 1903, Columbia University.		
Topics—Major, Physiological Optics; Minors, Therapeutics, Medicine.		
Witherspoon, Thomas Alfred.....	Tenn.....	26 Iowa Circle.
1893, graduated from United States Naval Academy.		
LL.B., 1891, M.S., 1897, Columbia University.		
Topics—Major, Chemistry; Minors, Chemistry, Electricity.		
Young, Mrs. Julia Elektra Ludlow..	N. Y.....	Les Ruches, Avon Fontainbleau, France.
B.A., 1906, Columbia University.		
M.A., 1909, The George Washington University.		
Topics—Major, Greek; Minors, Latin, Archæology.		
In Absentia.		

Name.	Legal residence.	City address.
Zerhusen, Frank Xavier.....	Ky.....	Holy Cross College, A.B., 1906, Notre Dame University. Topics—Major, German; Minors, German, History.
		Brookland, D. C.

UNDERGRADUATE COLLEGES AND DIVISIONS.

The following list includes all undergraduate students. The registration is indicated by the abbreviations: A.&S., for College of Arts and Sciences; Eng., for College of Engineering and Mechanic Arts; C.P.S., for College of the Political Sciences; T.C., for Teachers' College; Arch., for Division of Architecture. The letters c, e, and m, after the abbreviation Eng., indicate that the student is a candidate for the bachelor's degree in Civil, Electrical, or Mechanical Engineering; the absence of these letters indicates a special student.

Name.	Legal residence.	City address.
Ackerman, Thos. Crittenden, A.&S.D. C.....	Navy Yard.	
Affleck, Mrs. Philip G., T.C.....	D. C.....	3440 34th Place, Cleve- land Park.
Alden, Levieta Ruth, A.&S.....	D. C.....	809 L Street.
Alleger, Walter James, Eng.m....	D. C.....	143 U Street.
Allen, Nila Frances, A.&S.....	Ind.....	1303 N Street.
Alston, Larkin Roy, A.&S.....	La.....	1208 M Street.
Altizer, Posey John, C.P.S.....	Ky.....	941 H Street.
L.L.B., 1908, The George Washington University.		
Alvord, Margaret, A.&S.....	D. C.....	The Ontario.
Amateis, Roland Paul, Eng.c.....	D. C.....	1517 H Street.
Anderson, Edwin Lee, Eng.c.....	D. C.....	204 Hammond Court.
Argo, Reamer Wilkes, Eng.....	Md.....	1307 H Street.
Arledge, Caroline Mascott, A.&S...	D. C.....	2628 Garfield Street.
Armiger, S. Elmer, Arch.....	Md.....	1729 New York Ave.
Avera, Tom Arrington, Arch.....	N. C.....	1764 Columbia Road.
Avers, Henry Godfrey, A.&S.....	Ohio.....	8 4th Street, S. E.
Bader, Ralph H., C.P.S.....	Va.....	933 G Street.
B.A., 1909, Washington and Lee University.		
Baer, David Alphonse, A.&S.....	D. C.....	3044 N Street.
Baker, Wallace M., Eng.....	D. C.....	2301a N Street.
Ball, Wm. Curtis Cooley, Eng.c....	Md.....	824 6th Street, S. W.
Ballinger, Anita Moon, Arch.....	D. C.....	3423 Holmead Place.
Balloch, Agnes McGrew, A.&S....	D. C.....	1013 15th Street.
Barbour, Clara Velma, A.&S.....	Fla.....	703 East Capitol Street.
A.B., 1906, The George Washington University.		
Barger, Gerbase James Patterson,		
A.&S.....	D. C.....	1335 Mass. Ave., S. E.

Name.	Legal residence.	City address.
Barnes, C. Maurice, C.P.S.....	Va.....	Census Office.
Barrington, Wm. Edw. Jos., Arch.D. C.....		3215 O Street.
Baston, George H., A.&S.....	Me.....	Bureau of Chemistry.
Batt, Joseph Harper, A.&S.....	Del.....	The Lenox.
Bayly, Howard Paul, Eng.c.....	Me.....	1333 11th Street.
Beale, Hilda, A.&S.....	D. C.....	Hyattsville, Md.
Bell, Grace Hubbard, A.&S.....	D. C.....	1327 Connecticut Ave.
Bengston, Ida A., A.&S.....	Nebr.....	1931 17th Street.
Berry, Alice, T.C.....	D. C.....	1338 G Street.
Berry, Louise, T.C.....	Md.....	1919 K Street.
Berry, Roger Bernard, Arch.....	Md.....	1919 R Street.
Berthrong, Fred M., C.P.S.....	D. C.....	Cleveland Park, D. C.
Betts, Ada Rebecca, T.C.....	D. C.....	511 B Street, N. E.
Bevard, Katharine Harper, T.C....	D. C.....	The Gladstone, 1423 R Street.
Biondi, Harry James, Eng.....	D. C.....	508 7th Street, S. E.
Black, Hanson B., Eng.....	N. Y.....	918 18th Street.
Black, James Earl, A.&S.....	W. Va.....	1225 O Street.
Blackley, R. Bassett, Arch.....	Texas.....	1412 Mass. Ave.
Blakesley, Raphael Henry, A.&S....	Calif.....	2517 14th Street.
I.L.M., 1909, The George Washington University.		
Blasey, Joseph, Arch.....	D. C.....	214 Arthur Place.
Bliss, Henry Harmon, Jr., A.&S....	D. C.....	1923 15th Street.
Block, Bertha Babette, T.C.....	D. C.....	155 11th Street, N. E.
Blount, Walter Eames, C.P.S.....	D. C.....	3101 R Street.
Boeckel, William Jacob, A.&S....	Md.....	533 9th Street, S. E.
Boesch, Harry Luther, C.P.S.....	D. C.....	616 E Street, N. E.
Boesch, Paul Raymond, Eng.m....	Ill.....	616 E Street, N. E.
Bohleber, William, A.&S.....	Ill.....	Patent Office.
Bolton, Meade, Arch.....	D. C.....	Office Supervising Arch., Treasury Dept.
Booth, Frank Walworth, A.&S....	D. C.....	1525 35th Street.
B.S., 1877, Iowa State College.		
Botkin, Alice Sinclair, A.&S.....	D. C.....	1758 Q Street.
Boutell, Hugh Gates, Eng.m.....	Ill.....	The Highlands.
Bowen, Leonard Lee, Eng.c.....	Va.....	1300 Penna. Ave.
Bowen, Mortimer Williams, Eng..	Va.....	1300 Penna. Ave.
Bowen, Norris Loring, C.P.S.....	Va.....	411 Post Office Dept.
Bowen, Seth Thomas, Eng.c.....	Ohio.....	1117 17th Street.
Brackett, Corinne Elizabeth, A.&S.D. C.....		1464 Girard Street.
Brady, Johnson Camden, Eng....	W. Va.....	1819 Kalorama Road.
Brakhagen, Minnie Hulda, A.&S..	D. C.....	905 7th Street.
Brame, Arthur Hervey, Eng.e.....	D. C.....	1317 10th Street.

Name.	Legal residence.	City address.
Brandt, Milton W., A.&S.....	Ohio.....	1348 T Street.
Brastow, Katharine A., A.&S.....	N. Y.....	104, The Cordova.
Breen, Mary Cecilia, A.&S.....	D. C.....	1357 U Street.
B.S., 1909, The George Washington University.		
Breneman, Claude Royal, A.&S....	D. C.....	807 H Street.
Breuninger, Lewis Talmage, A.&S.D. C.....		18th and Park Road.
Brewer, Kinsey, A.&S.....	D. C.....	1126 25th Street.
Briggs, Henry Jay, Arch.....	R. I.....	1912 G Street.
Briggs, James P., A.&S.....	D. C.....	622 C Street, N. E.
Briggs, Leland Stanford, C.P.S....	Maine.....	The Hamilton.
Brock, Thomas S., Eng.....	D. C.....	1430 W Street.
Broomell, Arthur Williams, A.&S..	Md.....	723 19th Street.
A.B., 1906, Swarthmore College.		
Brown, Elizabeth Virginia, T.C....	D. C.....	1357 Euclid Street.
Brown, Forrest Augustus, A.&S....	W. Va.....	1700 15th Street.
LL.B., 1909, University of Virginia.		
Brown, Jane Brookfield E., T.C....	D. C.....	1509 R. I. Ave.
Brown, Mary, T.C.....	D. C.....	2464 Ontario Road.
Brown, Victor E., A.&S.....	N. Y.....	467 Penna. Ave.
Browning, Anna Melrose, A.&S....	D. C.....	3200 Highland Ave.
Bruninga, Mrs. Mary, A.&S.....	Ill.....	1509 3d Street.
Brusse, O. S., A.&S.....	Mich.....	2024 G Street.
Bryan, Albert William, C.P.S....	Md.....	Y. M. C. A.
Bryan, John Steinmetz, C.P.S....	Ga.....	2011 Q Street.
Bryant, Richmond, C.P.S.....	D. C.....	1007 Monroe Street.
Brylawski, Hortense, A.&S.....	D. C.....	1912 Calvert Street.
Bryson, Laura Elizabeth, T.C.....	D. C.....	714 12th Street, N. E.
Buchanan, Omar Bailey, Eng.e....	D. C.....	502 M Street.
Buckingham, Nevill, Arch.....	D. C.....	134 C Street, N. E.
Bullough, George Van Ness, A.&S.D. C.....		122 Tennessee Ave., N. E.
Bundick, Clarence Albert, Eng.c....	D. C.....	716 12th Street, N. E.
Bunting, Jacob Danforth, A.&S....	D. C.....	The Earlington.
Burchard, Edwin Day, Eng.c.....	D. C.....	1113 S Street.
Burden, Katherine, A.&S.....	D. C.....	The Franklin.
Burhen, Archer George, C.P.S....	Ohio.....	1326 L Street.
Burklin, Robert Reyburn, A.&S....	D. C.....	1131 Girard Street.
Burnett, Lyle Glack, A.&S.....	Mo.....	1913 Penna. Ave.
Burrell, William Webster, Eng.m..	D. C.....	2129 Penna. Ave.
Burritt, Alice, A.&S.....	D. C.....	The Cliffbourne.
Burton, Henry Morris, A.&S.....	Ky.....	621 19th Street.
Butman, Carl Hawes, Eng.m.....	Mass.....	1700 15th Street.
Byrne, George Aloysius, A.&S....	D. C.....	105 Md. Ave., N. E.
Byrne, Henry Herbert, A.&S.....	N. Y.....	3511 Center Street.
Calvert, Landon Ralls, Eng.e.....	Va.....	No. 300, District Bldg.

Name.	Legal residence.	City address.
Cameron, Myrle, A.&S.....	D. C.....	16th and Emerson Sts.
Campbell, Harry Hamilton, Eng.c..	D. C.....	The Vivans.
Campbell, Orland, A.&S.....	D. C.....	1343 Harvard Street.
Campbell, W. Ray, Arch.....	N. J.....	1120 13th Street.
Carlson, Oscar Henry Wm., C.P.S.Pa.....		62 Rhode Island Ave.
Carpenter, Essex Porter, Eng.c....	D. C.....	2005 G Street.
Carpenter, John Conduct, A.&S....	D. C.....	1318 Vermont Ave.
Carpenter, Lillian Evans, T.C....	D. C.....	205 D Street, N. E.
Carraher, Margaret Mary, T.C....	D. C.....	504 6th Street, S. W.
Carraher, Rose Gertrude, T.C....	D. C.....	504 6th Street, N. E.
Carter, Mabel Josephine, A.&S....	D. C.....	502 B Street, N. E.
Carty, Roy Franklin, Eng.m.....	D. C.....	Bureau of Standards.
Cash, Edith Katherine, A.&S.....	D. C.....	126 Tenn. Ave., N. E.
Cash, William Bogart, Arch.....	N. C.....	2516 17th Street.
Caspari, Elizabeth Anna, T.C....	D. C.....	35 S Street.
Chapin, Mabel Louise, A.&S.....	D. C.....	519 Stanton Place.
Chapman, Henry H., Eng.....	Md.....	1112 10th Street.
Chesbrough, Ralph F., C.P.S.....	Wis.....	2012 F Street.
Chien, Shii Fan, C.P.S.....	China.....	Chinese Legation.
Chubb, Herman Blancy, A.&S....	D. C.....	The Lennox.
Church, Grace Ella, A.&S.....	D. C.....	626 N. C. Ave., S. E.
B.S., 1908, Beloit College.		
Cissel, John Floyd, C.P.S.....	Md.....	1931 K Street.
Clark, Henry Culbertson, A.&S....	D. C.....	Takoma Park.
Clark, Lincoln R., C.P.S.....	Mo.....	1419 R Street.
L.L.B., 1908, University of Michigan.		
Clift, Linda Lee, A.&S.....	D. C.....	163 U Street.
Clyne, James Vard, Eng.....	Ill.....	2112 H Street.
Cochrane, John Edw. W., Eng.c..	D. C.....	1416 K Street.
Cockrell, Henry Ewing, A.&S....	D. C.....	1518 R Street.
Cockrell, Selwyn Kennedy, A.&S..	D. C.....	1050 W. Fayette Street, Baltimore, Md.
Coe, Mayne R., A.&S.....	N. C.....	Langdon, D. C.
Cohen, William I., Eng.....	Minn.....	617 K Street.
Collins, Mrs. Mary Deborah, A.&S.D.	C.....	1820 Newton Street.
Conard, Robert A., Eng.c.....	D. C.....	1410 H Street.
Conboye, William T., Arch.....	D. C.....	311 M Street.
Connelly, Mary A., T.C.....	D. C.....	1438 S Street.
Connor, Daniel Allman, Eng.c....	D. C.....	130 D Street, S. E.
Conwell, Rollin Nichol, Eng.e....	Ind.....	1302 Columbia Road.
Cooke, Carter B., Eng.....	D. C.....	1427 R Street.
Corning, Edward Burton, Arch....	D. C.....	1319 F Street.
Covell, David Ransom, A.&S.....	D. C.....	3221 11th Street.
Craig, Harold Kennedy, Eng.c....	D. C.....	2206 1st Street.

Name.	Legal residence.	City address.
Craighill, Susan Robins, T.C.....	D. C.....	3062 Q Street.
Crawford, Arthur B., A.&S.....	N. Y.....	1734 15th Street.
Crisp, Fred William, Eng.c.....	D. C.....	638 E Street, N. E.
Crone, Charles T., A.&S.....	Ind.....	1315 K Street.
Crowe, John Joseph, A.&S.....	D. C.....	Bladensburg Road, D. C.
Crown, James Edmund, A.&S.....	D. C.....	221 10th Street, S. E.
Cummins, Albert F., A.&S.....	D. C.....	221 11th Street, S. E.
Curtis, Myron Seaton, A.&S.....	Md.....	Chevy Chase, Md.
Dague, Roswell, A.&S.....	Wash.....	930 18th Street.
Daniels, Milton R., Eng.....	D. C.....	1133 Newton St., Brook- land, D. C.
Dans, José P., Eng.....	P. I.....	Coast & Geodetic Survey.
Davis, Minnie Carter, A.&S.....	D. C.....	218 F Street, N. E.
Davis, Rena Preston, A.&S.....	D. C.....	2212 1st Street.
DeBaun, Claude, C.P.S.....	Ariz.....	1132 8th Street.
Dembrowsky, William L., A.&S.....	D. C.....	708 H Street, N. E.
Denham, Ruth Millicent, A.&S.....	D. C.....	Manor House.
Denning, William Ira, A.&S.....	Ga.....	The Loretto.
De Riemer, Arthur Hyde, Eng.....	Ill.....	1461 Chapin Street.
Deyo, Clarence Eugene, A.&S.....	Conn.....	Customs Division, Treas- ury Dept.
Dobell, Roy Herbert, Arch.....	Ind.....	2017 H Street.
Dodd, Philip Lindsley, C.P.S.....	N. J.....	824 Connecticut Ave. A.B., 1908, Rutgers College.
Doing, Jennie E., A.&S.....	Md.....	1309 Fairmont Street.
Dolan, George Francis, Eng.m.....	N. J.....	1907 H Street.
Dollins, Hugh David, Eng.....	Fla.....	Washington Barracks.
Dolliver, Garrett Brown, A.&S.....	S. D.....	1415 Mass. Ave.
Donk, Marion Gilbert, Eng.c.....	Fla.....	No. 37, The Brunswick.
Donk, Peter, A.&S.....	Fla.....	The Brunswick.
Doonan, Katherine, A.&S.....	Ohio.....	2536 14th Street.
Dorsey, Susan Bianca, A.&S.....	D. C.....	1321 S Street.
Dougherty, Bruce Taylor, A.&S.....	N. Y.....	208 Indiana Ave.
Dougherty, Howard Francis, Eng.c.....	Md.....	824 13th Street.
Driscoll, Francis B., A.&S.....	Nebr.....	1805 3d Street, N. E. A.B., 1903, Creighton University.
Dudley, Caroline, A.&S.....	Va.....	1212 12th Street.
Dugan, John A., Eng.m.....	D. C.....	3419 Dent Place.
Dulin, Wm. Shelton Gordon, Eng.c.....	D. C.....	1420 Penna. Ave.
Dunbar, Ralph McNeal, A.&S.....	Md.....	Y. M. C. A.
Dutton, Donald Langley, Eng.c.....	D. C.....	1721 Kilbourne Place.
Dyson, Arnold Horton, Eng.c.....	R. I.....	3008½ R Street.
Earl, Charles Merritt, A.&S.....	Wis.....	1341 Q Street.

Name.	Legal residence.	City address.
Earll, Donald Montgomery, A.&S.	Md.	Chevy Chase, Md.
Eatherly, Walter S., A.&S.	Tenn.	1831 G Street.
L.L., 1904, University of Nashville.		
Eaton, Ernest Risley, A.&S.	Australia.	1748 S Street.
Ebeling, Albert H., A.&S.	D. C.	U. S. Naval Medical School Hospital.
Eberly, Clarence F., A.&S.	Ohio.	1733 19th Street.
Eisenberg, Arthur Alex'r, A.&S.	D. C.	1213 4½ Street.
Eldridge, Hattie Dayton, T.C.	N. C.	1627 Lamont Street.
Ellis, Harry Van Horn, A.&S.	D. C.	203 C Street, N. E.
Ellison, William, Jr., A.&S.	Mo.	Bureau of Chemistry.
Elwood, William Adam, Eng.c.	D. C.	635 F Street, N. E.
Ely, Selden Marvin, C.P.S.	D. C.	50 S Street.
L.L.B., 1894, L.L.M., 1895, B.A., 1908, M.A., 1909, The George Washington University.		
Emory, Maud S., A.&S.	D. C.	306 F Street.
Engel, Morris Edward, Eng.m.	Pa.	1016 S. C. Ave., S. E.
Esser, Harry H., Arch.	Ill.	1807 H Street.
Estey, Kate May, T.C.	D. C.	2504 Cliffbourne Pl.
Estler, Harry Smith, Eng.m.	Va.	1245 31st Street.
Estrada, Rafael, Eng.	Cuba.	119 2d Street, N. E.
Ezdorf, Richard Robert von, Arch.	Pa.	1324 Riggs Street.
Ezdorf, Robert von, Arch.	Pa.	1324 Riggs Street.
Fant, Jessie Du Bois, T.C.	Idaho.	115 12th Street, S. E.
Farmer, Matthew S., Jr., A.&S.	N. C.	154 A Street, N. E.
Farnham, Arthur Blanchard, Eng.c.	D. C.	1733 R Street.
Farwell, Clarence Gilbert, A.&S.	Mass.	2217 Penna. Ave.
Fehr, John Ralph, Eng.e.	Ill.	1538 17th Street.
Feldman, Peter Roy, A.&S.	Wis.	1310 Park Road.
Fickas, Melville P., A.&S.	Ariz.	Civil Service Com.
Finch, Elmer Harrison, Eng.c.	Mich.	307-b P. O. Dept.
Finkenaar, Robert Griff, Arch.	Mo.	The Farragut.
Fisher, Dwight Wilton, A.&S.	D. C.	1921 G Street.
Fitch, Theodore Allen, A.&S.	D. C.	1769 Columbia Road.
Fitch, William Reed, A.&S.	N. D.	2003 G Street.
Fithian, Harry C., A.&S.	Pa.	19th and K Streets, The Prince Karl.
Ph.M., 1899, Bucknell University.		
Fleming, John Paton, A.&S.	Va.	1847 Wyoming Ave.
Fogle, Fred M., A.&S.	Minn.	War Department.
Foster, Carrington, Arch.	Va.	1323 Q Street.
Foster, Esther, A.&S.	D. C.	110 W Street.
Foster, Ethel Elizabeth, C.P.S.	D. C.	19 Iowa Circle.
Diploma of Fine Arts, 1909, Columbia University.		

Name.	Legal residence.	City address.
Foster, Ruth, A.&S.....	D. C.....	119 W Street.
Fowler, Lena, A.&S.....	D. C.....	212 P Street.
Fox, Paul Jefferson, A.&S.....	Ill.....	Bureau of Chemistry. B.S., 1900, University of Chicago.
Frazier, Robert Thos., Jr., Eng.m.....	D. C.....	3016 15th Street.
Freeman, Leroy A., Eng.....	D. C.....	46 V Street.
Frey, Ralph Wylie, A.&S.....	D. C.....	1343 Q Street.
Froom, John D., Eng.....	Mass.....	138 R Street, N. E.
Frost, Harry Talfour, Arch.....	Ohio.....	1748 S Street.
Fuerst, George M., Arch.....	Wis.....	315 5th Street, S. E.
Fuller, Aubrey Vail, A.&S.....	D. C.....	2318 1st Street.
Galbraith, Robert Karl, Arch.....	D. C.....	1735 1st Street.
Gardner, Burton E., C.P.S.....	Ind.....	1103 Park Road.
Gardner, Helen Burnett, T.C.....	D. C.....	623 E. Capitol Street.
Gareissen, Mrs. Mabel F., Arch.....	D. C.....	Woodley Inn.
Garlock, Ellen C., A.&S.....	D. C.....	203, The Ontario.
Garner, Lucian, Jr., Eng.....	D. C.....	1828 S Street.
Garr, Zaidee Janet, T.C.....	Ga.....	1215 K Street.
Garrett, William Ashton, Eng.....	Md.....	1321 Newton St., Brook- land, D. C.
Gary, Howland R., Eng.m.....	Va.....	R. F. D., No. 2, Alexan- dria, Va.
Geary, William Joseph, Arch.....	D. C.....	54 Rhode Island Ave.
Geschickter, Jeanette, A.&S.....	D. C.....	1239 12th Street.
Gibbons, Jessie Ercell, A.&S.....	D. C.....	1314 N. C. Ave., N. E.
Giffin, Calvin E., A.&S.....	Ohio.....	Geological Survey.
Gill, Wilbur Draper, Eng.c.....	D. C.....	1925 Calvert Street.
Gillespie, Mary Gwinn, A.&S.....	Texas.....	1832 Columbia Road.
Gilliss, Helen, T.C.....	D. C.....	1307 Kenyon Street.
Given, Mary Ella, T.C.....	D. C.....	The Olympia.
Glancy, Francis Patrick, Arch.....	D. C.....	1413 G Street.
Glass, Robert Lewis, Eng.e.....	D. C.....	1524 Columbia Street.
Glenn, Laura Emily, T.C.....	D. C.....	708 8th Street, N. E.
Goding, Anne M., T.C.....	D. C.....	1419 R Street.
Gordon, Alice Gertrude, A.&S.....	D. C.....	1600 16th Street.
Graff, Leva Bee, A.&S.....	Ill.....	Dewey Hotel. A.B., 1906, Woman's College.
Green, Burton Richard, A.&S.....	D. C.....	1259 Irving Street. L.L.B., 1909, Georgetown University.
Green, Elsie Eugenia, A.&S.....	D. C.....	600 23d Street.
Greenberg, Louis, A.&S.....	D. C.....	612 N Street.
Greenlees, Albert Arnold, A.&S.....	Ohio.....	1221 O Street.
Griffin, Harry Kemp, A.&S.....	Ill.....	Bureau of Standards.

Name.	Legal residence.	City address.
Grunwell, Paul C., A.&S.....	D. C.....	1805 Belmont Road. B.M.E., 1907, Kentucky State University.
Guerdrum, George Herbert, Eng.c.P. I.....		2418 14th Street.
Gunning, James McIntosh, Eng.e..N. J.....		1515 O Street.
Gwinn, Thomas R., Eng.e.....	Md.....	1645 K Street.
Haddaway, Samuel McKim, Eng..Pa.....		715 A Street, S. E.
Haines, Ora E., A.&S.....	D. C.....	Civil Service Com.
Haller, Thomas Edward, Arch....	D. C.....	447 Lamont Street.
Halsey, Arthur Sherman, Eng.m..Pa.....		207 East Capitol St.
Hamilton, Walter Clarence, Eng..D. C.....		406 6th Street, S. E.
Hamlin, Herbert Samuel, A.&S...Utah.....		1225 O Street.
Hammond, Bennett, Eng.e.....	Pa.....	738 Gresham Street.
Hance, Emma Osborn, A.&S.....	Va.....	R. F. D., No. 4, Station A.
Handy, Elias Hurst, Arch.....	Md.....	116 3d Street, N. E.
Hansen, Otto W., Eng.c.....	Ill.....	1807 H Street.
Hansen, Wilhelm Gustav, C.P.S...Denmark..		728 3d Street, N. E.
Hanson, Frank Blair, A.&S.....	Ill.....	921 P Street.
Hardenstein, Mrs. Flor. P., A.&S..La.....		1449 U Street.
Hardin, Alene, A.&S.....	D. C.....	The Balfour.
Hardy, Margaret Boude, A.&S...D. C.....		638 E. Capitol Street.
Hare, Butler Black, C.P.S.....	S. C.....	1829 F Street.
Harrington, Geo. Traver, A.&S...Vt.....		214 12th Street, S. W. B.S., 1909, University of Vermont.
Harris, Albert L., Arch.....	England...	1505 Lamont Street.
Harrison, Robert Horace, Eng.c...D. C.....		2208 1st Street.
Hart, Charles, T.C.....	D. C.....	515 B Street, N. E.
Hart, R. S., Arch.....	D. C.....	1536 6th Street.
Haslup, Alice Elma, T.C.....	D. C.....	2114 18th Street.
Hathaway, Lillie Theresa, A.&S...Ohio.....		1536 I Street.
Haycock, Robert Lee, T.C.....	D. C.....	2525 Wisconsin Ave.
Hayden, Elizabeth Anne, T.C....D. C.....		Stratford Hotel.
Hayton, Charles Henry, A.&S....So. Africa.		Takoma Park.
Hawkins, Margaret Amelia, T.C...D. C.....		2312 Washington Circle.
Hawkins, Morton Wells, Arch....Wash.....		1764 K Street.
Healy, Ralph Francis, Eng.....D. C.....		1203 E. Capitol Street.
Heidenreich, Fred'k Hans, A.&S...D. C.....		1501 Gales Street, N. E.
Heilprin, Marion, A.&S.....	D. C.....	2620 University Place.
Heitmuller, George Roeder, A.&S.D. C.....		1307 14th Street.
Helwig, Julius Clarence, Eng.c....Ind.....		2018 F Street.
Hendry, M. Leland, A.&S.....	Md.....	Bethesda, Md.
Henry, Ralph Dangerfield, Eng.c..Md.....		Chevy Chase, Md.
Hess, Mrs. Eva, A.&S.....	Calif.....	1221 Newton St., Brook- land, D. C.

Name.	Legal residence.	City address.
Hession, John H., Eng.c.....	Mass.....	1419 W Street.
Hill, Florence A., A.&S.....	N. Y.....	3217 11th Street.
Hill, Ralph Waldo, C.P.S.....	Mo.....	1538 17th Street.
LL.B., 1908, University of Virginia.		
Hilleary, Mary Beatrice, T.C.....	D. C.....	3314 P Street.
Hobbs, Enid Marian, A.&S.....	Canada.....	1228 B Street, S. W.
Hobson, Frank Millard, Eng.c....	D. C.....	2013 G Street.
Hodgkins, George Wilson, A.&S...	D. C.....	1830 T Street.
Hodgkins, Howard W., Eng.c....	D. C.....	1830 T Street.
Hoffman, Edwin S., Eng.e.....	Pa.....	523 B Street, N. E.
Holden, John Greene, Eng.....	Md.....	Am. Sec. & Trust Co.
Holder, Herbert Stanley, Eng....	Iowa.....	110 F Street, S. E.
Hole, Myra Cadwalader, A.&S....	Nebr.....	24 Grant Place.
Holland, Sarah Blair, T.C.....	D. C.....	1421 S Street.
Hollyday, James Earle, A.&S....	Md.....	1526 29th Street.
Holmes, Ronald M., A.&S.....	D. C.....	726 3d Street, N. E.
Hooton, Philip T., Arch.....	D. C.....	1952 Calvert Street.
Horgan, Francis Vincent, Eng.c...	D. C.....	733 13th Street.
Horn, Oscar Leonard, C.P.S.....	Calif.....	2517 14th Street.
LL.B., 1908, University of California.		
Hornung, Elmer Engelken, Arch...	Iowa.....	1523 Corcoran Street.
Hospital, Ralph, A.&S.....	D. C.....	3500 15th Street, Brook- land, D. C.
Hough, Edgar Joseph, Eng.m....	D. C.....	919 French Street.
Hough, Roland P., Eng.c.....	Va.....	Ballston, Va.
Houghton, Carlos Cranford, A.&S.D.	C.....	2011 Kalorama Road.
Howard, Frank Atherton, Eng.m...	D. C.....	15, The Savoy.
Howard, Lela, A.&S.....	Mich.....	2610 Garfield Street.
Howell, Humphrey Daniel, A.&S...	D. C.....	724 10th Street, N. E.
Hoyme, Guy L., Arch.....	Va.....	53 U Street.
Hubbard, Hermon M., Jr., C.P.S...	Ohio.....	1915 U Street.
Hughes, William G., Eng.m.....	D. C.....	The Eutaw, 14th & Mon- roe.
Hummer, Elizabeth Alice, A.&S...	D. C.....	638 East Capitol Street.
Huntting, Horace Parsons, Eng.c...	N. Y.....	1807 Wyoming Ave.
Ilustre, Eustacio S., C.P.S.....	P. I.....	1119 K Street.
LL.B., 1908, The George Washington University.		
Imbach, Elizabeth E., A.&S.....	W. Va.....	1123 13th Street.
Ingersoll, Edwin Henry, A.&S....	D. C.....	Bureau of Animal Ind'y.
Jackson, Maude Lillian, A.&S....	D. C.....	3630 13th Street, N. E.
Jacobs, Benjamin Richard, A.&S...	D. C.....	Bureau of Chemistry.
Jeffrey, Frank Rumer, A.&S.....	Wash.....	1515 O Street.
Jenkins, Oliver Lloyd, Eng.m....	Ind.....	718 N. C. Ave., S. E.

Name.	Legal residence.	City address.
Jennings, Charles Thomas, Eng.e.	D. C.	1223 10th Street.
Jennings, Samuel Joseph, A.&S.	D. C.	1223 10th Street.
Johnson, Charles Albert, T.C.	D. C.	2837 12th Street, N. E.
Johnson, Robert, C.P.S.	Mo.	1500 Columbia Road.
Johnson, Virginia Head, T.C.	D. C.	1342 R. I. Ave.
Jones, Calvin Clark, Arch.	D. C.	312 E Street, N. E.
Jones, Eleanor Isabelle, A.&S.	D. C.	426 Luray Place.
Jones, Robert Pepin, A.&S.	D. C.	1343 Clifton Street.
Josselyn, Paul R., C.P.S.	Iowa.	2012 F Street.
A.B., 1909, Beloit College.		
Justement, Louis, Arch.	N. Y.	914 R Street.
Kause, Robert Lincoln, Eng.c.	Ohio.	1905 Jackson St., N. E.
Keats, Harold, A.&S.	D. C.	1806 S Street.
Kelley, Eva Phelps, A.&S.	D. C.	Takoma Park.
Kemper, Graham, C.P.S.	Ky.	951 Massachusetts Ave.
B.S., 1896, Transylvania University.		
M.S., 1897, Kentucky University.		
Kennedy, Charles Bayard, Eng.e.	D. C.	1304 13th Street.
King, Winifred Mary, T.C.	D. C.	1803 14th Street.
Kittredge, Scott F., C.P.S.	Me.	50 M Street.
Kinsell, Rex Emir, A.&S.	Iowa.	1335 Mass. Ave., S. E.
Kinyoun, Joseph Perry, A.&S.	D. C.	1423 Clifton Street.
Klee, Charles R., Arch.	N. Y.	3224 R Street.
Koontz, Claude B., C.P.S.	D. C.	429 1st Street, S. E.
Lamson, Frank S., Eng.e.	D. C.	2439 18th Street.
Lancaster, Charles E., Arch.	Pa.	1101 Penna. Ave., S. E.
Lansburgh, Mrs. Dora H., A.&S.	D. C.	Arlington Hotel.
Lasier, Emery Liebschutz, Eng.c.	N. H.	1427 Girard Street.
Lasley, Dana McGuffey, Eng.m.	D. C.	The Albemarle.
Latimer, Philip Averitt, Eng.c.	D. C.	226 12th Street, S. E.
Lawrence, Glenn Rupert, Eng.c.	D. C.	3425 14th Street, Brook- land, D. C.
Lawson, Lucile, T.C.	D. C.	815 C Street, N. E.
Lay, Tracy, C.P.S.	Ala.	H. of R. Office Bldg.
Le Duc, Henry Sumner, Eng.	D. C.	817 Varnum Street.
Lee, Lelia, T.C.	D. C.	515 10th Street, N. E.
Le Fevre, Edwin, A.&S.	D. C.	1420 Newton Street.
Leonard, Lewis Thompson, A.&S.	D. C.	520 G Street, N. E.
Leonard, William Michael, Eng.e.	D. C.	520 G Street, N. E.
Lepper, Henry Albert, A.&S.	D. C.	1620 6th Street.
Lewis, Leon Laurence, C.P.S.	Wis.	1117 17th Street.
Liebschutz, Eugenie, T.C.	France.	3409 Brown Street.
Lincoln, Sereta, A.&S.	Mass.	2119 R Street.

Name.	Legal residence.	City address.
Lind, Ida May, T.C.....	D. C.....	506 A Street, N. E.
Lindsay, Alfred Briscoe, A.&S....	D. C.....	933 F Street.
Lippett, Minnie Henderson, A.&S..	D. C.....	2803 P Street.
Litchfield, Henry Edward, Eng....	D. C.....	1240 Half Street, S. E.
Llufrio, Albert Vincent, A.&S....	D. C.....	618 8th Street, N. E.
Lockie, Joseph Alexander, Arch....	D. C.....	Y. M. C. A.
Lodholz, Louis, A.&S.....	Pa.....	2205 K Street.
Lovering, George Venum, A.&S..	Mass.....	Interstate Com. Com'n.
Lowe, Edith Blinston, A.&S.....	D. C.....	2622 Woodley Place.
Lucas, Anthony F., Jr., Eng.....	D. C.....	1406 16th Street.
Luebker, Timm Adolph, Eng.c....	D. C.....	136 Fenwick Street, N. E.
Lusby, Charles Edward, A.&S....	D. C.....	2909 O Street.
McAuley, Hugh Nesbit, Arch.....	D. C.....	530 21st Street.
McCalip, Curtis Edgar, Eng.m....	Ind.....	111 13th Street, S. E.
McCammon, James Newton, Arch.	Ark.....	1523 Corcoran Street.
McCarty, Cora, T.C.....	D. C.....	1234 Mass. Ave.
McColm, Anna M., T.C.....	Iowa.....	1769 Columbia Road.
McConnell, Harry R., Eng.m....	Va.....	218 6th Street, S. E.
McCormick, John D., Eng.c.....	D. C.....	235 10th Street, S. E.
McKeen, William D., C.P.S.....	Mass.....	1203 11th Street.
B.S., 1904, Dartmouth College.		
McKenna, Coe Aloysius, C.P.S....	Ore.....	1500 Columbia Road.
McLaughlin, Wm. Francis, Arch..	D. C.....	1101 K Street.
McLean, Henry Clay, Arch.....	D. C.....	1373 Irving Place.
McLear, Alice Bush, T.C.....	D. C.....	1316 L Street.
McPike, Martin John, Eng.c.....	Pa.....	812 1st Street.
Mahon, James J., A.&S.....	Kans.....	1503 12th Street.
Manning, Donald Holstein, Eng.c..	D. C.....	1326 Harvard Street.
Manning, Thomas R., Eng.c.....	Pa.....	26 2d Street, N. E.
Marcus, Mandel, A.&S.....	Wis.....	1310 Park Road.
Maret, Jeanne, T.C.....	France.....	1719 13th Street.
Marquez, Hilario, A.&S.....	P. I.....	2026 G Street.
Marsh, Allen Johnson, A.&S....	Ohio.....	McKinley High School.
Marsh, Charles Wilder, A.&S....	D. C.....	3430 Brown Street.
Martin, Harold Kaye, Arch.....	D. C.....	319 E Street, N. E.
Marvin, Francis Edwin, Eng.c....	D. C.....	606 F Street, N. E.
Mason, Charles S., Arch.....	D. C.....	Langdon, D. C.
Mason, Josephine Dwight, T.C....	Mass.....	132 A Street, N. E.
Mason, Stephen C., A.&S.....	D. C.....	2207 Franklin St., N. E.
Masters, Lilla Virginia, A.&S....	D. C.....	3611 10th Street.
Matthews, Etta Helene, T.C.....	D. C.....	125 New York Ave.
Mattingly, Gentry Heard, Eng.e...	D. C.....	475 F Street, S. W.
Mayfield, Charlotte Virginia, A.&S.	D. C.....	1912 Biltmore Street.

Name.	Legal residence.	City address.
Mayne, John C., A.&S.....	D. C.....	4201 Brightwood Ave.
Maxcy, Kenneth Fuller, A.&S.....	D. C.....	1118 R. I. Ave.
Maxson, Louis Archer, A.&S.....	Md.....	Kensington, Md.
Meier, Julius Earnest, A.&S.....	D. C.....	318 Mass. Ave., N. E.
Menchero, José G., Eng.c.....	Cuba.....	811 13th Street.
Merritt, Eugene, C.P.S.....	D. C.....	1778 Willard Street.
A.B., 1903, Cornell University.		
Merritt, Leonard Atkins, C.P.S....	Minn.....	154 F Street, S.E.
LL.B., 1904, Columbian University.		
LL.M., 1905, The George Washington University.		
Meyer, Hans C., Arch.....	D. C.....	The Montgomery.
Meyer, Will Beck, A.&S.....	D. C.....	609 P Street.
Michaelsen, Elsie Eleonore, T.C., D. C.....		3145 Mt. Pleasant Street.
Middlekauf, Walter David, Arch..	D. C.....	814 Newton St., Brook-
		land, D. C.
Middleton, Herbert Paul, Eng.c...	N. Y.....	9th and Longellow Sts.
Middleton, Rankin York, Arch.....	D. C.....	2134 Flagler Street.
Miller, Clarence William, Eng.e...	Ind.....	2018 F Street.
Miller, Dayton B., A.&S.....	D. C.....	15 Quincy Place.
Miller, Elmon Adams, Arch.....	D. C.....	17 Quincy Place.
Miller, Elton Willard, Eng.....	Calif.....	1539 Monroe Street.
B.S. in M.E., 1908, The George Washington University.		
Miller, Thomas Woodnutt, C.P.S..	Del.....	1920 I Street.
Ph.B., 1908, Yale University.		
Millott, Augustus Francis, A.&S...Ill.....		1403 R. I. Ave.
LL.B., 1908, LL.M., 1909, Georgetown University.		
Millott, Eugene, A.&S.....	Ill.....	913 H Street.
LL.B., 1908, Georgetown University.		
Minnix, Mary Genevieve, A.&S....	D. C.....	3426 13th Street.
Moneyway, James Lewis, A.&S....	Ala.....	1454 Fairmont Street.
Moody, Theodore Lyman, Eng.c...	Md.....	1512 P Street.
Moore, Helen Barbara, A.&S.....	D. C.....	1255 I Street, N. E.
Moore, Kate Carroll, A.&S.....	D. C.....	2024 15th Street.
Moore, Maurice Malcolm, Eng....	Mich.....	1869 Columbia Road.
Moore, Raymond Gaillard, Arch...	Md.....	Friendship Heights, Be-
		thesda, Md.
Moore, Susanne A., T.C.....	D. C.....	1308 Girard Street.
Morgan, Mary Ella, T.C.....	D. C.....	2750 14th Street.
Morris, Leland B., C.P.S.....	Pa.....	Hotel Richmond.
Morrison, William Lester, A.&S...Mass.....		Bureau of Chemistry.
Motley, Benjamin F., C.P.S.....	W. Va.....	714 19th Street.
LL.B., 1908, Kansas City School of Law.		
Moudy, Alvin Curtis, Eng.m.....	Texas.....	2124 Penna. Ave.

Name.	Legal residence.	City address.
Mullen, Charles E., C.P.S.....	Wis.....	1914 H Street.
Muncey, Eliot May, A.&S.....	D. C.....	1337 R Street.
Munroe, Dorothy Barker, A.&S....	R. I.....	2115 S Street.
Myers, Charles Claude, A.&S.....	D. C.....	203 R Street.
Myers, Henry Bernard, Eng.c....	Md.....	1412 Columbia Street.
Nairn, William Wallace, Jr., Eng..	D. C.....	901 Lawrence St., Brook- land, D. C.
Neilson, Joseph N., Arch.....	Minn.....	1615 Florida Ave.
Newbold, Katharine M., A.&S....	D. C.....	1362 Kenyon Street.
Nelson, Axel, A.&S.....	N. D.....	718 19th Street.
Newhouser, Enola H., A.&S.....	D. C.....	217 East Capitol Street.
Newton, Grace Gadsdon, T.C.....	D. C.....	1452 Fairmont Street.
Nicholson, Helen Sellman, A.&S..	D. C.....	2821 Q Street.
Norman, Nicholas V., C.P.S.....	Wash.....	305, Post Office Dept.
North, Hilda, T.C.....	D. C.....	2807 14th Street.
Noyes, Ruth, A.&S.....	D. C.....	1730 New Hamp. Ave.
Nuber, Louis Irvine, Eng.e.....	D. C.....	1244 Irving Street.
Nutt, George Sinclair, A.&S.....	Ill.....	2124 Penna. Ave.
Nuncez, Maria J., C.P.S.....	Cuba.....	1750 Mass. Ave. D.C.I., 1909, University of Havana.
Nyemaster, Jesse Ray, C.P.S.....	Iowa.....	216 Md. Ave., N. E. LL.B., 1909, The George Washington University.
O'Brien, Howell Vincent, Arch....	D. C.....	319 B Street, N. E.
O'Rourke, John, Arch.....	D. C.....	Station G., 2472.
Offutt, Viola, T.C.....	Md.....	Bethesda, Md.
Oliver, Roland B., A.&S.....	Calif.....	Geological Survey.
Olmsted, Elizabeth, T.C.....	D. C.....	816 B Street, N. E.
Olsen, Elmer Leroy, Eng.....	Wis.....	933 H Street.
Ossire, Cora Amelia, T.C.....	D. C.....	2721 P Street.
Osterhout, Karl Jackson, A.&S....	D. C.....	613 C Street, S. E.
Outwater, Mrs. Kate Sorrell, T.C..	Va.....	620 F Street, S. W.
Padgett, Harold Dement, Eng.c....	Md.....	816 18th Street.
Palmer, Elizabeth Downer, A.&S..	D. C.....	1300 Columbia Road.
Palmer, Ely Eliot, C.P.S.....	R. I.....	The Lennox. A.B., 1908, Brown University.
Panopio, Eliseo M., Eng.....	P. I.....	Coast & Geodetic Survey.
Pardee, Elmer Witmer, Eng.e....	N. Y.....	Civil Service Com.
Parham, Sidney Feild, Eng.c.....	D. C.....	2129 P Street.
Parker, Claude Eubank, Arch....	D. C.....	1634 Rhode Island Ave.
Parker, Clara M. W., A.&S.....	D. C.....	1410 Euclid Street.
Parker, Edwin Pearson, Jr., Eng.e.	D. C.....	1751 Church Street.
Parry, William, Eng.e.....	Pa.....	1314 G Street.
Patchell, Fred James, Eng.c.....	D. C.....	357 N Street, S. W.

Name.	Legal residence.	City address.
Patterson, Ruth Capelle, T.C.....	D. C.....	2016 15th Street.
Pearce, Lida Marie, T.C.....	D. C.....	1737 S Street.
Pearson, Martha Blanche, T.C....	D. C.....	1829 Monroe Street.
Petrovitch, Woislav, C.P.S.....	Servia....	2100 H Street.
Pevare, John Francis, A.&S.....	N. H.....	Dept. of Agriculture.
Phillips, Edson, A.&S.....	D. C.....	1210 Girard Street.
Phillips, John Andrew, Eng.c.....	D. C.....	943 S Street.
Phillips, Marguerite, A.&S.....	D. C.....	1707 21st Street.
Pierce, Flora, A.&S.....	D. C.....	1243 5th Street.
Piper, Edgar Raymond, Eng.....	D. C.....	2805 Adams Mill Road.
Plass, Joseph, A.&S.....	Germany...	225 H Street.
Plummer, Willis Jordan, C.P.S...	Va.....	937 Massachusetts Ave.
Poole, De Witt Clinton, Jr., C.P.S..	Ill.....	1021 Vermont Ave.
A.B., 1906, University of Wisconsin.		
Poole, George, Eng.m.....	D. C.....	903 E Street, S. E.
Pope, George S., Eng.m.....	D. C.....	1444 U Street.
Porter, Agnes May, Arch.....	D. C.....	3225 11th Street.
Porter, Irwin, Arch.....	D. C.....	3225 11th Street.
Porter, Kirk Harold, Arch.....	Ill.....	623 19th Street.
Potbury, Robert John, Eng.c.....	D. C.....	1131 Euclid Street.
Potter, Charles Hollister, A.&S...	N. C.....	918 F Street.
Pozen, Morris A., A.&S.....	D. C.....	1410 I Street.
Phar.D., 1908, The George Washington University.		
Pratt, Jesse G., A.&S.....	D. C.....	1112 E. Capitol Street.
Pratt, Mary B., T.C.....	Mass.....	1381 Irving Street.
Prentiss, Augustin Mitchell, Eng.c.	S. C.....	1727 Church Street.
Prince, Henry Ferris, A.&S.....	Ill.....	3113 13th Street.
Pugh, Mary Anderson, A.&S.....	D. C.....	1802 R Street.
Purcell, Tobias Edwin, Arch.....	N. Y.....	816 18th Street.
Rafter, Robert R., A.&S.....	D. C.....	3105 16th Street.
Raiden, Frank B., C.P.S.....	Java.....	1505 Vermont Ave.
Rea, Gladstone Sheridan, C.P.S...	Miss.....	Normandie Hotel.
Redfield, Arthur Huber, A.&S....	D. C.....	9 Randolph Pl., N. E.
Reges, Max. F., Eng.c.....	Pa.....	1113 5th Street.
Renner, Wilbert Vernon, Eng.c....	D. C.....	1405 F Street.
Requena, Manuel Gabriel, Eng.c...	Mexico....	811 13th Street.
Rich, Percy Rishworth, Arch.....	Me.....	227 N. J. Ave., S. E.
Richard, Vernon Irving, A.&S....	D. C.....	309 B Street, N. E.
Richards, Alice Mary, T.C.....	D. C.....	1114 25th Street.
Richards, Henry Tilton, A.&S....	Mass.....	1525 L Street.
Richards, Louis N., C.P.S.....	Ill.....	1529 I Street.
I.L.B., 1901, Northwestern University.		
Rives, John Joseph, T.C.....	D. C.....	316 9th Street, N. E.

Name.	Legal residence.	City address.
Roberts, Norman, A.&S.....	D. C.....	25th and E Streets. M.D., 1897, University of Pennsylvania.
Robins, Louise S., A.&S.....	N. Y.....	1931 17th Street.
Robinson, Thomas Baker, Arch....	D. C.....	1833 Corcoran Street.
Roche, Elsie, T.C.....	D. C.....	1238 Columbia Road.
Rogers, Frank Beecher, Eng.c....	N. Y.....	1342 Girard Street.
Rogers, O. S., Arch.....	Ill.....	1430 W Street.
Rogers, Silas Wesley, C.P.S.....	Ark.....	1831 G Street. L.L.B., 1906, University of Arkansas.
Rollins, Hazen Paton, Eng.c.....	Mich.....	1717 Willard Street.
Rose, Anna Lorette, A.&S.....	D. C.....	306 Randolph Pl., N. E.
Rose, Mary Estelle, T.C.....	D. C.....	2963 Tilden Street.
Ross, Lily Aurelia, T.C.....	Mo.....	1452 Belmont Street.
Ross, Mabelle L., A.&S.....	D. C.....	2518 13th Street.
Roundy, P. V., A.&S.....	N. Y.....	Geological Survey.
Rowlett, Allen H., Arch.....	Va.....	1530 9th Street.
Rowley, Clifford Alonzo, C.P.S....	D. C.....	1344 Kenyon Street.
Russell, Lewis H., Arch.....	N. Y.....	3538 Warder Street.
Ryan, William David, A.&S.....	Mo.....	1400 L Street.
Safford, Howard Palmer, Eng.e....	D. C.....	2445 Georgia Ave.
Sanders, Elsie, T.C.....	D. C.....	1360 Kenyon Street.
Sargent, Rufus Harvey, A.&S....	D. C.....	Geological Survey.
Saum, Irving Randolph, Eng.c....	D. C.....	1308 Girard Street.
Saunders, Clara Rossman, T.C.....	Ohio.....	The Brunswick.
Schladt, George J., Eng.e.....	D. C.....	820 B Street, N. E.
Schmitt, Hugo Rudolph, Eng.e....	D. C.....	211 Florida Ave.
Schmitt, Waldo Lasalle, A.&S....	D. C.....	211 Florida Ave.
Schreiber, Ernst Otto, Jr., A.&S..	D. C.....	642 E Street, N. E.
Schultz, Mrs. Dorothy F. N., A.&S..	D. C.....	The Plaza.
Schwartz, Abraham Theo., A.&S..	N. Y.....	U. S. Naval Medical School Hospital.
Scott, Joseph A. P., Jr., Eng.c....	D. C.....	902 Md. Ave., N. E.
Scott, Leila Fordham, A.&S.....	D. C.....	649 B Street, N. E.
Scott, Walter Clifford, A.&S.....	D. C.....	21 9th Street, N. E.
Scrivener, Emily, T.C.....	D. C.....	1012 Monroe St., N. E.
Sebree, Jessie Lydia, A.&S.....	D. C.....	3241 N Street.
Se Legue, Charles Albert, A.&S...Ind.....		912 H Street.
Shackelford, Laura, A.&S.....	D. C.....	924 Md. Ave., N. E. B.S., 1909, The George Washington University.
Shipley, John Robert, A.&S.....	N. C.....	1702 F Street.
Shoemaker, Clarence Ray'd, A.&S.D. C.....		3116 P Street.
Shuman, Royal Lewis, A.&S.....	D. C.....	1730 M Street.
Sidwell, Mrs. Frances H., A.&S...D. C.....		804 21st Street.

Name.	Legal residence.	City address.
Silvester, Jane B., A.&S.....	D. C.....	2005 Kalorama Road.
Silvester, Margaret G., T.C.....	D. C.....	The Mendota.
Simpson, John Millard, A.&S.....	Wis.....	1228 13th Street.
Simpson, Walter S., Arch.....	D. C.....	508 10th Street, S. E.
Skidmore, Elnathan J., A.&S.....	Mich.....	War Department.
Slarrow, Mrs. Mary Gordon, A.&S. D. C.....		1308 13th Street.
Slarrow, Malcolm Gordon, A.&S. D. C.....		1308 13th Street.
Slattery, Harry A., C.P.S.....	S. C.....	23 1st Street.
Sloane, Charles Edward, Eng.	D. C.....	1733 T Street.
Smallwood, Dorothy A., A.&S.....	D. C.....	2107 S Street.
Smith, Charles Henry, Eng.m.....	Iowa.....	386, Navy Dept.
Smith, Chester Harvey, Eng.e.....	D. C.....	327 2d Street, N. E.
Smith, Clara Louise, T.C.....	D. C.....	327 2d Street, N. E.
Smith, Duncan Campbell, A.&S....	Md.....	Rockville, Me.
Smith, Hoxsie Yost, Eng.e.....	D. C.....	1619 17th Street.
Smith, Marshall J., Arch.....	D. C.....	44, Tennessee Apts.
Smith, Philip Mack, A.&S.....	Mass.....	Civil Service Com.
B.A., 1905, Amherst College.		
Smith, Rodney Marshall, Eng.c....	D. C.....	619 12th Street, N. E.
Snelling, Henry Hornor, Eng.m....	Va.....	3522 10th Street.
Snyder, Harry P., A.&S.....	Pa.....	520 14th Street, N. E.
Spangler, Lewis Clayton, A.&S....	D. C.....	1829 G Street.
Spencer, William Warren, Arch....	D. C.....	1724 Willard Street.
Sprague, Blanche Zipporala, T.C..	N. J.....	23 1st Street, N. E.
Stannard, Winfield H., A.&S.....	Mass.....	1206 O Street.
Stauffer, Cleve Echternacht, A.&S.	Pa.....	1812 K Street.
Stauffer, May Katherine, A.&S....	D. C.....	1513 28th Street.
Stauffer, Ruth M., A.&S.....	D. C.....	1513 28th Street.
A.B., 1906, Mount Holyoke College.		
Staves, Marion C., Eng.....	Iowa.....	1723 De Sales Street.
Stead, Manning Force, Arch.....	D. C.....	1230 17th Street.
Stearns, Orlo Foster, A.&S.....	Mass.....	1610 13th Street.
Steever, Laura Winfield, A.&S....	Md.....	1115 P Street.
Sterns, Cletus O., A.&S.....	Ohio.....	Hygienic Laboratory.
Stevenson, Arthur James, Eng.e..	Ohio.....	Wisconsin Ave., Ten-
		nallytown, D. C.
Stevenson, Perry Judson, A.&S....	D. C.....	157 U Street.
Stewart, Elmer, A.&S.....	D. C.....	1812 Vermont Street.
Stewart, Paul Morton, A.&S.....	Ohio.....	1219 M Street.
Stockard, Marietta, T.C.....	N. C.....	1627 Lamont Street.
Stockton, Thomas Jefferson, Eng..	D. C.....	1944 2d Street.
Stoulil, E. J., Eng.c.....	N. D.....	609 13th Street.
Stout, Joseph Duerson, A.&S.....	D. C.....	1416 9th Street.

Name.	Legal residence.	City address.
Stutler, Ward, Arch.....	W. Va.....	1719 G Street.
Stuwe, John Daniel, Eng.c.....	Minn.....	1017 P Street.
Summy, Helen, A.&S.....	D. C.....	920 19th Street.
Summy, Katherine Strong, A.&S....	D. C.....	920 19th Street.
Swartzell, John Naylor, Eng.m....	Md.....	Chevy Chase, Md.
Taft, William Nelson, C.P.S.....	S. C.....	31, The Willson. B.A., 1909, Rock Hill College.
Taylor, Irving Paul, A.&S.....	D. C.....	1433 Belmont Street.
Taylor, James Archibald, Eng....	D. C.....	626 C Street, N. E.
Taylor, James Norman, A.&S....	Del.....	1315 R Street.
Taylor, Olivia Alexander, A.&S....	D. C.....	1330 U Street.
Taylor, Margaret Randolph, A.&S.D. C.....		1330 U Street.
Tegeler, Bessie Lee, A.&S.....	D. C.....	325 E Street, N. E.
Tennyson, James Anna, T.C.....	D. C.....	224 8th Street, S. W.
Thatcher, Arthur S., A.&S.....	Pa.....	Bureau of Chemistry.
Thomas, William J. D., A.&S....	D. C.....	1226 Irving Street, N. E.
Thompson, Ernest Jeffery, A.&S....	D. C.....	904 Mass. Ave., N. E.
Thompson, Herbert H., Eng.m....	Ohio.....	904 Mass. Ave., N. E.
Thompson, Walter H., Eng.e....	Pa.....	1746 S Street.
Thomson, Alfred Ray, C.P.S.....	Md.....	1538 17th Street.
Thomson, Anna Speck, A.&S....	Ky.....	2701 14th Street. B.S., 1901, Smith College.
Thomson, Harriet H., A.&S.....	D. C.....	3423 16th Street.
Thorne, Harold Carrier, Eng.e....	D. C.....	2346 25th Street, Wood- ridge, D. C.
Thorwarth, Julia Helen, A.&S....	Minn.....	1320 Park Road.
Tiffany, Emma Ruth, A.&S.....	D. C.....	3409 Brown Street.
Tolson, Lillian, T.C.....	Md.....	125 12th Street, N. E.
Tong, William Su-hwa, Eng.c.....	China.....	1800 U Street.
Town, Edith H., A.&S.....	Va.....	1415 Chapin Street.
Townsend, Anna Virginia, T.C....	D. C.....	1847 U Street.
Treynor, George Percy, A.&S....	D. C.....	21 Pleasant Street, Ana- costia, D. C.
Tucker, Prescott Stearns, A.&S....	D. C.....	633 G Street, N. E.
Tunstall, Florence Marie, A.&S....	D. C.....	1302 L Street.
Truesdell, Stephen Riggs, Eng.c....	D. C.....	1121 Harvard Street.
Tulloss, Joseph Clark, Eng.m....	Va.....	1110 F Street.
Udy, Stanley Hart, A.&S.....	N. Y.....	Y. M. C. A.
Ulrickson, Hilda Louise, A.&S....	Vt.....	617 21st Street.
Underwood, Harriet, T.C.....	D. C.....	2801 Q Street.
Underwood, Mary Louise, A.&S....	D. C.....	129 6th Street, N. E.
Urner, Nina, A.&S.....	D. C.....	40 C Street, N. E.
Vandegriest, John Leslie, Eng.c....	D. C.....	1214 G Street, N. E.

Name.	Legal residence.	City address.
Van Fossen, John Ray, A.&S.....	Iowa.....	1012 11th Street. A.B., 1904, Cornell College.
Van Loock, Louis Anthony, Eng....	D. C.....	104 15th Street, N. E.
Veihmeyer, Frank, Eng.c.....	D. C.....	1518 S Street.
Vernon, James Mercer, C.P.S.....	Wash.....	1519 20th Street.
Vorkoeper, John, A.&S.....	Wis.....	1433 N. J. Ave.
Waggaman, Clarke, Arch.....	D. C.....	2600 Connecticut Ave.
Wagner, Harold J., C.P.S.....	N. Y.....	Department of State. L.L.B., 1909, The George Washington University.
Waldner, Paul Jacob, A.&S.....	Pa.....	Navy Department.
Walker, Alberta, T.C.....	D. C.....	1634 S Street.
Walker, Bertha Florine, T.C.....	D. C.....	420 B Street, N. E.
Walker, Rosalie, A.&S.....	D. C.....	420 B Street, N. E.
Wall, Adelaide Dorothy, T.C.....	D. C.....	4011 14th Street.
Walter, Wallace Wilson, A.&S....	D. C.....	The Luzon.
Walton, George Pelham, A.&S....	D. C.....	Cor. 22d and Franklin, Langdon, D. C.
Waters, Joseph Henry, Eng.c.....	D. C.....	3227 11th Street.
Waters, Suzanne Beatrice, T.C....	D. C.....	3009 11th Street.
Watts, Mary Jane, T.C.....	D. C.....	1106 Columbia Road.
Webb, James William, Eng.....	D. C.....	420 10th Street, S. E.
Weber, John Augustus, Arch.....	D. C.....	518 6th Street, N. E.
Weedon, Caroline Elizabeth, T.C..	D. C.....	1829 Monroe Street.
Weller, Ethel Marguerite, A.&S...D.	C.....	753 8th Street, S. E.
Wenderoth, Ernest Ferd'd, Eng.e..	N. Y.....	Bureau of Standards.
Wharton, Roger Daniel, Eng.c....	D. C.....	The Concord.
Whitall, Mary Louisa, A.&S.....	N. J.....	The Woodley.
White, Elsie Parker, A.&S.....	D. C.....	1417 Park Road.
White, Mary Josephine, T.C.....	Ohio.....	National Park Seminary, Forest Glen, Md.
White, Mabel Louise, A.&S.....	Miss.....	1536 I Street.
Whitehead, Edmonia P., A.&S....	Va.....	1613 30th Street.
Whiting, Louis Wine, Eng.....	Wash.....	Hyattsville, Md.
Wiegand, Henry Frank, Eng.e....	D. C.....	824 6th Street, S. W.
Wiest, Edward Snyder, T.C.....	Pa.....	1443 Mass. Ave.
Wild, Alfred E., Jr., Eng.m.....	D. C.....	Bureau of Standards.
Wilhelm, Robert Mason, Eng.e....	Md.....	12 10th Street, N. E.
Will, E. M., Arch.....	Fla.....	313 M Street.
Williams, Edith Arvonja, A.&S....	D. C.....	1602 N. J. Ave.
Williams, G. Ellis, A.&S.....	Md.....	P. O. Box 31, Silver Spring, Md.
Wills, R. Mayo, Eng.....	Va.....	34 The Melton.
Willson, Charles Carter, Eng.m....	D. C.....	57 R Street, N. E.

Name.	Legal residence.	City address.
Wilson, Irving Thomas, Eng.c....	Md.....	Somerset, Bethesda, Md.
Wilson, John J., Arch.....	Conn.....	1408 V Street.
Wilson, Margaret Posey, A.&S....	D. C.....	219 1st Street, N. E.
Wilson, Marcia, A.&S.....	D. C.....	The Cairo.
Wilson, Ruth, A.&S.....	D. C.....	1510 13th Street.
Wing yan, Ho., Eng.c.....	China.....	Chinese Legation.
Wise, Clarence E., A.&S.....	W. Va.....	1447 R Street.
Wiseman, Edward Wallace, Eng.c.	Mo.....	3629 11th Street.
Witten, Aubrey Bowen, Arch.....	Mo.....	2518 13th Street.
Wong, Ung Cek, Eng.m.....	China.....	1521 I Street.
Woodruff, Gertrude, A.&S.....	Iowa.....	306 M Street.
Woods, Mary Margaret, T.C.....	Ga.....	1215 K Street.
Woodward, Esther R., T.C.....	D. C.....	125 New York Ave.
Woolsey, Lester Hood, C.P.S....	N. Y.....	3513 Center Street.
L.L.B., 1908, The George Washington University.		
Wysor, Dorothy Eads, A.&S.....	Va.....	715 6th Street.
Yang, Sui Chi, Eng.c.....	China.....	1800 U Street.
Yoder, Bertha Alice, T.C.....	Kans.....	144 11th Street, S. E.
Yoder, Bessie Lee, T.C.....	Kans.....	144 11th Street, S. E.
Young, Mrs. Irene Ottilie, A.&S..	Iowa.....	2210 Penna. Ave.
Zalvidea, Juan A., Eng.....	P. I.....	115 S Street.
Zapf, Lacey C., C.P.S.....	Tenn.....	War Department.
Zapoleon, Louis B., C.P.S.....	Ohio.....	Y. M. C. A.
Zehnder, Hillary M., C.P.S.....	Pa.....	The Bachelor.

Summary.

GRADUATE STUDENTS:

Students in attendance.....	10
Candidates for D.C.L. degree.....	1
Candidates for C.E. degree.....	2
Candidates for E.E. degree.....	2
Candidates for M.S. degree.....	7
Candidates for M.A. degree.....	24
Candidates for Jur.D. degree.....	1
Candidates for Ph.D. degree.....	43
	— 90

UNDERGRADUATE STUDENTS:

College of Arts and Sciences:

Candidates for A.B. degree.....	133
Candidates for B.S. degree.....	9
Candidates for B.S. in Chem. degree.....	33
Special	130
	— 305

College of Engineering and Mechanic Arts:

Candidates for B.S. in C.E. degree.....	73
Candidates for B.S. in E.E. degree.....	33
Candidates for B.S. in M.E. degree.....	31
Special	43
	— 180

College of the Political Sciences:

Candidates for A.B. degree.....	16
Candidates for M.Dip. degree.....	9
Special	39
	— 64

Teachers' College:

Candidates for A.B. degree.....	67
Special	19
	— 86

Division of Architecture:

Candidates for the B.S. in Arch. degree.....	18
Special	56
	— 74
	799

PROFESSIONAL DEPARTMENTS.

DEPARTMENT OF LAW.

Bachelor of Laws and Bachelor of Law.

First Year.

Name.	Legal residence.	City address.
Applebaum, Aaron Eleazar.....	N. J.....	1311 7th Street.
Baker, John Earl.....	Wis.....	2012 G Street.
Ph.B., 1906, M.A., 1908, University of Wisconsin.		
Barber, Azro Lucien.....	N. Y.....	1515 O Street.
A.B., 1907, Syracuse University.		
Beale, Frederick Wight.....	Ill.....	2242 Ontario Road.
M.E., 1899, Stevens Institute of Technology.		
Bergman, Theodore Robert.....	N. Y.....	206 Indiana Ave.
Bickel, Harvey Cleveland.....	Pa.....	1318 12th Street.
Boeckel, William Jacob.....	Md.....	533 9th Street, S. E.
Bond, Eugene Webster.....	Ill.....	404 Shepherd Street,
		Petworth, D. C.
Boughton, George Wilson.....	D. C.....	1424 K Street.
Brown, Lee Hoxil.....	D. C.....	2464 Ontario Road.
Calley, Walter England.....	Pa.....	1503 12th Street.
S. B., 1903, University of Chicago.		
Carpenter, Newton Ford.....	D. C.....	2268 Cathedral Ave.
Clark, Henry Culbertson.....	D. C.....	Takoma Park, D. C.
B.A., 1910, The George Washington University.		
Clifton, John Williams.....	Tenn.....	Y. M. C. A.
B.A., 1903, M.A., 1904, Vanderbilt University.		
Coleman, Harry Edward.....	Pa.....	1412 Belmont Street.
Coulson, Robert Earl.....	N. Y.....	1422 Belmont Street.
A.B., 1909, Cornell University.		
Cox, John Dee.....	Texas.....	Patent Office.
Davis, Max Warburton.....	Conn.....	628 A Street, N. E.
M.E., 1908, Cornell University.		
Davis, William Edward.....	Md.....	1205 N Street.
A.E., 1907, Western Maryland College.		
De Baun, Claud.....	Ariz.....	1132 8th Street.
Denman, Charles Arthur.....	Neb.....	604 C Street, N. E.
De Wolf, Richard Crosby.....	Mass.....	Library of Congress.
Dobson, James Martin.....	S. D.....	119 2d Street, N. E.
B.Litt., 1909, Dakota Wesleyan University.		

Name.	Legal residence.	City address.
Dulles, John Foster.....	N. Y.....	1323 18th Street. A.B., 1908, Princeton University.
Dunlop, Walter Grafton.....	D. C.....	3102 Q Street. B.S., 1909, Princeton University.
Dutton, Clarence Benjamin.....	Mass.....	1209 Emerson Street.
Fehr, John Ralph.....	Ill.....	1538 17th Street.
Feland, John Caldwell.....	Ky.....	3032 Dent Place.
Foote, Morris Cooper.....	D. C.....	16 5th Street, S. E.
Forbes, Harvey Dwight.....	N. Y.....	2955 Tilden Street.
Frazier, Robert Thomas, Jr.....	D. C.....	1823 Lamont Street.
French, Louis Edwin.....	La.....	506 House Office Bldg.
Galleher, Parke Ashby.....	D. C.....	116 3d Street, N. E.
Gamble, Ralph Abernethy.....	S. D.....	U. S. Senate. Litt.B., 1909, Princeton University.
Gauss, Henry Colford.....	D. C.....	1359 Park Road.
Geiman, Daniel J.....	Va.....	1404 M Street.
Gerard, Charles Wesley.....	D. C.....	2212 Flagler Place. A.B., 1906, Ohio State University.
Gerhardt, Louis Webster.....	Pa.....	1202 K Street.
Gordon, Ray Bragdon.....	Mass.....	1723 Euclid Street.
Gordon, Spencer.....	D. C.....	3028 Q Street. A.B., 1909, Princeton University.
Guptill, Leon Clifton.....	Me.....	320 Maryland Ave., N. E. B.A., 1909, Colby College.
Hanna, Forest Walker.....	Mo.....	910 Westminster Street. B.A., 1909, Northwestern University.
Hart, Wayne Maris.....	D. C.....	1536 6th Street.
Hawley, Charles Taft.....	Mass.....	116 Maple Ave., Takoma Park, Md. B.S., 1898, M.E., 1908, Worcester Polytechnic Institute.
Hayward, Afton Smith.....	Mass.....	1148 17th Street. B.S., 1906, Amherst College.
Helms, Birch.....	Pa.....	Colorado Building. B.A., 1909, Yale University.
Herman, Morris D.....	Minn.....	617 K Street.
Hidalgo y Rizal, Alfredo.....	P. I.....	234 F Street. B.S., 1903, Liceo de Manila.
Hoover, Joseph Raymond.....	D. C.....	1118 9th Street.
Houston, William Cannon, Jr.....	Tenn.....	House of Rep.
Howard, Hugh McCormick.....	D. C.....	1849 Wyoming Ave. Graduate, 1902, Virginia Military Institute.
Hudson, Douglas Granville.....	Kans.....	1324 I Street.
Humason, Harris Monroe.....	Conn.....	1445 Mass. Ave. A.B., 1909, Yale University.

Name.	Legal residence.	City address.
Hunter, Orren Franklin.....	S. C.....	1537 Monroe Street. B.S., 1894, South Carolina Military Academy.
Hutchins, William Ambrose.....	Ohio.....	1217 Harvard Street.
Kause, Arthur John.....	D. C.....	1905 Jackson St., N. E.
Kelly, Lawler John.....	Iowa.....	2145 K Street.
Kemper, William Holbrook.....	D. C.....	1323 Clifton Street.
Knox, Hugh Smith.....	Pa.....	1527 K Street. B.A., 1907, Yale University.
Kunkel, Frederick Eugene.....	Pa.....	1538 17th Street.
Lamb, William Ers.....	D. C.....	1322 I Street. B.S., 1909, Dartmouth College.
Lawrence, Wayman Clarkson, Jr.....	Ohio.....	New Varnum Hotel. Litt.B., 1909, Princeton University.
Lazarus, Isaac Burt.....	Mass.....	1121 6th Street.
Leavitt, Ezekiel.....	D. C.....	1201 N. Capitol Street. Odessa Gymnasium, Russia.
Ledon y Queipo, Gonzalo.....	Cuba.....	1915 14th Street.
Lindeman, Clarence Albert.....	Calif.....	807 11th Street.
Lotka, Alfred James.....	D. C.....	2016 G Street. B.Sc., 1901, Birmingham (England) University. M.A., 1909, Cornell University.
Macfarland, Horace Greeley.....	D. C.....	1727 F Street. Graduate, 1891, United States Naval Academy.
Mapes, Carl Anthony.....	Mich.....	507 6th Street, N. E.
Matthews, Emerson Waldo.....	Ohio.....	The Wellington. A.B., 1891, Butler College. A.M., Harvard University.
McElfresh, Ralph Finley.....	D. C.....	309 M Street. C.E., 1908, Lehigh University.
Miles, Edwin Ruthven.....	Utah.....	1333 R Street.
Miller, Thomas Woodnutt.....	Del.....	1920 I Street. Ph.B., 1908, Yale University.
Miller, Lawrence Arnold Gale.....	Mass.....	Patent Office. A.B., 1908, Harvard University.
Moakley, Harry Joseph.....	Conn.....	1433 Fairmont Street. Ph.B., 1908, Yale University.
Momsen, Richard Paul.....	Wis.....	House of Rep.
Moore, James Ballard.....	D. C.....	1869 Columbia Road.
Moore, Rowles.....	Ky.....	937 Massachusetts Ave.
Morris, Leland Burnette.....	Pa.....	Hotel Richmond.
Mueller, Edward Louis.....	D. C.....	803 8th Street.
Munden, Ralph.....	Pa.....	The Portner. M.E., 1906, Cornell University.

Name.	Legal residence.	City address.
Murray, Harry Keyes.....	Miss.....	Room 176, House of M.A., 1903, St. Aloysius College. Rep. Building.
Nairn, William Wallace, Jr.....	D. C.....	901 Lawrence St., N. E.
Newhouser, Roy Lyman Joseph.....	D. C.....	217 E. Capitol Street. B.A., 1909, The George Washington University.
Nixon, Cleon Robert.....	Ill.....	1110 New York Ave. B.S., 1909, Shurtleff College.
Ogilby, Charles Fitz Randolph, Jr.....	D. C.....	1528 P Street.
Oren, James Paul.....	Pa.....	Y. M. C. A.
Orme, James Booth Lockwood.....	D. C.....	1623 28th Street. S.B., 1906, Massachusetts Institute of Technology.
Packard, Roscoe Milliken.....	D. C.....	Patent Office. A.B., 1899, M.A., 1900, Western Reserve University.
Perham, Sidney Feild.....	D. C.....	2129 P Street.
Parkinson, George Doney.....	Idaho.....	House of Rep.
Patrick, Rollin Moore.....	Idaho.....	Reclamation Service. A.B., 1901, Davidson College.
Peck, George Curtis.....	N. Y.....	1515 O Street.
Powell, Wilson Albert.....	Va.....	1515 O Street.
Prescott, Edward Chepmell.....	Iowa.....	312 A Street, N. E.
Preston, Neil De Forest.....	N. Y.....	1824 California Street. M.E., 1908, Cornell University.
Ramsay, Robert Everett.....	Md.....	615 22d Street.
Richards, Ralph Walter Bergman.....	D. C.....	101 Massachusetts Ave.
Richardson, Madison.....	S. C.....	1802 G Street. B.A., 1909, Wofford College.
Roberts, David Robert.....	Utah.....	715 15th Street.
Rose, Claude Custer.....	Ohio.....	1212 Irving Street. M.E., 1905, Ohio State University.
Scanlan, Tom.....	S. Dak.....	1404 L Street.
Scheffer, Joseph Walter.....	Conn.....	2124 Pennsylvania Ave.
Schnare, Lester L.....	Ga.....	Y. M. C. A.
Schreiber, Ernst Otto, Jr.....	D. C.....	642 E Street, N. E. B.A., 1910, The George Washington University.
Shaw, Paul James.....	Pa.....	1826 G Street.
Sheppard, Carl Dunkle.....	Ohio.....	Florence Court. Ph.B., 1902, Ohio State University.
Simon, Rabbi Abram.....	D. C.....	2606 University Place. Graduate, 1894, Cincinnati Hebrew Union College. B.L., 1894, University of Cincinnati. Ph.D., 1907, The George Washington University.
Smith, Charles Watson.....	Pa.....	1111 M Street.
Smith, St. Clair.....	S. Dak.....	1404 L Street.

Name.	Legal residence.	City address.
Spessard, Walter Valentine.....	Pa.....	1115 K Street. A.B., 1909, Lebanon Valley College.
Straw, Charles Alonzo, Jr.....	Del.....	3014 Dent Place. A.B., 1901, Harvard University.
Sutton, Loyd Hall.....	Mass.....	1333 Fairmont Street. S.B., 1908, Massachusetts Institute of Technology.
Townsend, Wilson Lewis.....	Md.....	Kensington, Md.
Viles, Voler V.....	Mo.....	328 Maryland Ave., N. E.
von Schrader, Atreus Hargadine..	Mo.....	2162 Florida Ave. A.B., 1909, Harvard University.
Wheeler, Lucien Charles.....	D. C.....	The Duddington.
Yancey, Charles Layton.....	Va.....	1515 O Street. B.A., 1908, Randolph-Macon College.
Young, George William.....	D. C.....	1365 Meridian Street.
Zeh, Henry William.....	D. C.....	1357 Harvard Street.

Second Year.

Alexander, Preston Carter.....	Mo.....	1110 Rhode Island Ave. A.B., 1909, University of Missouri.
Anderson, Charles.....	Texas.....	216 N. Capitol St.
Baer, David Alphonse.....	D. C.....	3044 N Street. B.A., 1910, The George Washington University.
Baldwin, Edward Damon.....	Ore.....	House of Rep. B.Lit., 1906, Whitman College. M.A., 1909, The George Washington University.
Beneman, George.....	Md.....	1336 7th Street.
Berry, James William.....	D. C.....	14 3d Street, S. E. B.A., 1909, The George Washington University.
Bloomer, George Beale.....	D. C.....	1410 G Street.
Burns, Walter William.....	N. Y.....	518 Shepherd Street. M.E., 1906, Cornell University.
Butler, Comfort Straight.....	Ill.....	26 Iowa Circle. A.B., 1909, University of Illinois.
Byrn, Edward Wright, Jr.....	Md.....	Silver Spring, Md.
Callister, Edward Richard.....	Utah.....	407 B Street, N. E.
Carpenter, John Condict.....	D. C.....	1318 Vermont Ave. M.E., 1908, Cornell University.
Church, Melville Durant.....	D. C.....	1608 20th Street.
Councilor, James Allan.....	Iowa.....	2012 1st Street.
Cox, Henry Aubrey.....	Tenn.....	Y. M. C. A.
Curl, Joseph Ryland.....	D. C.....	2312 I Street. B.S., 1909, The George Washington University.
Davis, Warren Jefferson.....	Va.....	26 Iowa Circle. B.A., 1903, Eastern College.

Name.	Legal residence.	City address.
Disque, William Alfred.....	Ky.....	Y. M. C. A.
Dodge, Parker Van Patten.....	D. C.....	134 B Street, N. E.
S.B., 1907, Massachusetts Institute of Technology.		
Du Bois, Henry Pastor.....	Pa.....	1421 Chapin Street.
M.E., 1907, Cornell University.		
Eickhoff, Theodore Henry.....	Ind.....	1522 16th Street.
B.S. in E.E., 1908, Purdue University.		
Farmer, Matthew Singleton, Jr....	N. C.....	154 A Street, N. E.
Fauntleroy, John Smith Young....	La.....	House of Rep.
A.B., 1905, Louisiana State University.		
Fischer, Stanley Herman.....	D. C.....	1515 T Street.
Foo, Hsen Shuen.....	China.....	Chinese Legation.
A.B., 1906, The Ching Chong School.		
Fraser, William Wright.....	Md.....	Patent Office.
A.B., 1905, New Windsor College.		
Gerhart, Herbert Benjamin.....	Pa.....	918 23d Street.
Gill, Walter Josiah, Jr.....	Mass.....	Patent Office.
S.B., 1904, Massachusetts Institute of Technology.		
Goode, Philip Burwell.....	D. C.....	Patent Office.
A.B., 1907, Harvard University.		
Graves, Sheldon Heber.....	D. C.....	1221 K Street.
B.S., 1904, Columbian University.		
M.S., 1906, The George Washington University.		
Gray, Jay Lyman.....	Me.....	320 Maryland Ave., N. E.
A.B., 1908, Bowdoin College.		
Gross, Le Roy Coates.....	N. J.....	1202 K Street.
Herriott, David Paul.....	Pa.....	1700 15th Street.
A.B., 1905, Washington and Jefferson College.		
Hilton, Charles Vanderbilt.....	Md.....	3264 N Street.
Hutchinson, Frederick Porter....	Kans.....	1421 Chapin Street.
Hynson, Richard Washburn.....	D. C.....	1335 N Street.
Johnston, Horace Stuart.....	D. C.....	122 F Street, S. E.
Kemper, Edward Crawford.....	D. C.....	1323 Clifton Street.
Lilly, Scott Henry.....	Iowa.....	4122 7th Street.
B.A., 1897, Cornell College.		
Linnell, William Shepherd.....	Me.....	320 Maryland Ave., N. E.
A.B., 1907, Bowdoin College.		
Long, Franklin Samuel.....	D. C.....	2206 Flagler Place.
Manning, George Madison A.....	Ky.....	2024 G Street.
Mechlin, Ernest Frederick.....	D. C.....	Patent Office.
B.S., 1907, The George Washington University.		
Miller, Herman.....	Nebr.....	Patent Office.
B.S., 1898, Nebraska Wesleyan University.		

Name.	Legal residence.	City address.
Moore, Hervey Studdiford.....	N. J.....	1700 15th Street.
Moyer, Samuel.....	Pa.....	323 W Street, N. E.
Myers, John Dashiell.....	D. C.....	1634 Riggs Place.
Neal, Franklin Gilman.....	Mass.....	1623 Park Road.
Ph.B., 1908, Yale University.		
Nicholson, Soterios.....	Greece.....	1801 G Street.
O'Neal, Warwick Christy.....	D. C.....	District Building.
C.E., 1906, Pennsylvania Military College.		
Owen, Richard Blakelock.....	D. C.....	1504 H Street.
Palais, Maurice.....	Mass.....	206 Indiana Avenue.
Paltridge, George Henry.....	Ill.....	1909 I Street.
Place, Ernest Frederic Alan.....	N. Y.....	House of Rep.
Preston, J. Stanley.....	N. Y.....	Y. M. C. A.
Reavis, Andrew Bryant.....	Tenn.....	Patent Office.
Rowland, Guy Edwin.....	Texas.....	Chevy Chase, Md.
Rush, Clifford Alvin.....	Kan.....	Y. M. C. A.
Schoenfeld, Hans Fred. Arthur.....	N. J.....	3448 24th Place, Cleve-
land Park, D. C.		
B.A., 1907, M.A., 1909, The George Washington University.		
Sheridan, Thomas Harold.....	N. H.....	Y. M. C. A.
Shuster, William Morgan.....	D. C.....	1722 Q Street.
Stebbins, George Edwin.....	Mass.....	Patent Office.
A.B., 1903, Bates College.		
Ph.D., 1907, Clark University.		
Stinchfield, Ray Lewis.....	Mass.....	Y. M. C. A.
B.S., Worcester Polytechnic Institute.		
Smith, Jesse Bond.....	D. C.....	101 Chestnut Street, Ta-
koma Park, D. C.		
Taylor, George Carroll.....	Va.....	1515 O Street.
Thorp, Clarendon Herbert.....	Ohio.....	824 8th Street.
Tilton, Rufus Harold.....	Mass.....	26 Iowa Circle.
Ph.B., 1908, Wesleyan University.		
Walker, John Earl.....	Mich.....	1012 15th Street.
B.S., 1907, Kalamazoo College.		
B.S., 1907, Chicago University.		
Wann, Eugene Charles.....	D. C.....	144 F Street, S. E.
Warden, Franklin Milton.....	Ill.....	26 Iowa Circle.
Webber, Lane Davis.....	Ind.....	905 13th Street.

Third Year.

Allee, James Frank, Jr.....	Del.....	523 13th Street.
Barrick, Henry Llewellyn.....	Neb.....	The Plymouth.
Birney, William McDowell.....	D. C.....	1516 22d Street.

Name.	Legal residence.	City address.
Black, Charles Frederick.....	Vt.....	1101 14th Street.
Ph.B., 1907, University of Vermont.		
Blount, Walter Eames.....	D. C.....	3101 R Street.
Bradley, Paul Earl.....	Ill.....	Y. M. C. A.
Brantley, William Gordon, Jr.....	Ga.....	2024 G Street.
A.B., 1907, University of Georgia.		
Calvert, John Wentworth.....	Md.....	1750 Corcoran Street.
Campbell, Philip Barraud.....	D. C.....	1977 Biltmore Street.
Carpenter, Walter Clayton.....	R. I.....	Y. M. C. A.
Ph.B., 1906, Brown University.		
Caywood, Charles Chester.....	D. C.....	1629 Newton Street.
Crafts, Frederick Albert.....	Mass.....	1700 15th Street.
Crowell, William Butterworth.....	Ohio.....	516 Shepherd Street.
Dahn, Franz Frederick Wm.....	Minn.....	1515 O Street.
B.S., 1909, The George Washington University.		
Dallwig, Paul.....	Wis.....	1931 K Street.
Davenport, Lewis Howard.....	N. Y.....	207 9th Street, S. W.
Dodson, James Dunbar.....	D. C.....	1714 F Street.
Everett, Frank Orear.....	Mo.....	916 14th Street.
B.A., 1909, The George Washington University.		
Faulkner, William Ernest.....	Ky.....	7 S Street.
B.A., 1907, Union College.		
Fenwick, Frank Knox.....	Mo.....	1229 15th Street.
Ford, Frank Farnsworth.....	Mich.....	26 Iowa Circle.
Garrett, Clyde Davis.....	D. C.....	945 O Street.
Garrett, George Everett.....	Va.....	Patent Office.
Gates, Edward Percy.....	D. C.....	3506 Center Street.
B.A., 1908, The George Washington University.		
Gonzalez, Antonio Cornelius, Jr.....	N. Y.....	1417 K Street.
Graff, William Archibald.....	Va.....	1322 Vermont Ave.
Graves, Pleasant Fowler.....	Texas.....	26 Iowa Circle.
Ph.B., 1905, Southwestern University.		
Grover, William Robinson.....	Mich.....	1012 15th Street.
Ph.B., 1907, Kalamazoo College.		
Hellen, Arthur.....	D. C.....	1731 20th Street.
Hemmick, Frank Schley.....	D. C.....	1700 15th Street.
Hill, Herman Henry.....	Mass.....	.60 M Street.
A.B., 1907, Dartmouth College.		
Holcombe, Amasa Maynard.....	Mass.....	1325 Vermont Ave.
B.S., 1904, Massachusetts Institute of Technology.		
Hubbard, Lyle.....	Iowa.....	1700 15th Street.
Hupper, Roscoe Henderson.....	Me.....	320 Maryland Ave., N. E.
A.B., 1907, Bowdoin College.		

Name.	Legal residence.	City address.
Kitselman, Harry Louis.....	Ind.....	The Burlington.
Le Duc, Louis Bronson.....	D. C.....	1403 21st Street.
Mackenzie, Robert Lundie.....	Ore.....	807 11th Street.
MacPhail, Leland Stanford.....	Mich.....	The Toronto.
McCray, Claud Henry.....	N. Y.....	930 18th Street.
B.S., 1907, Hobart College.		
Oberlin, John Jay.....	Md.....	Patent Office.
A.B., 1901, Washington and Lee University.		
Patterson, Matthew Warren.....	Ark.....	Dept. of Agriculture.
Pease, Ferdinand Henry.....	Vt.....	1101 14th Street.
A.B., 1907, University of Vermont.		
Pillow, Gideon Johnston.....	La.....	1464 Clifton Street.
Scantling, Philip Lee.....	D. C.....	1627 R Street.
Simmons, Berkeley Leo.....	D. C.....	Kellogg Building.
Simmons, William Wyatt.....	Miss.....	Y. M. C. A.
B.A., 1903, Mississippi College.		
Sincerbeaux, Chauncey Milton....	N. Y.....	1920 I Street.
A.B., 1905, Yale University.		
Singleton, Ogle Ridout.....	D. C.....	2020 H Street.
B.A., 1908, The George Washington University.		
Smith, Conger Ryder.....	Mich.....	Y. M. C. A.
Smith, George Thomas.....	Md.....	437 Massachusetts Ave.
Smith, Thomas William.....	Idaho.....	Y. M. C. A.
Smithers, Nathaniel Barratt.....	Del.....	518 13th Street.
Smoot, John Daniel Kurtz.....	Va.....	Langley, Va.
Steele, Benjamin Ulen.....	Ky.....	The Lincoln Apts.
Sullivan, Horace Moore.....	Tenn.....	1468 Clifton Street.
Swift, John Tuttle.....	Mass.....	1101 14th Street.
Taylor, Kenneth.....	Minn.....	1433 Belmont Street.
B.S., 1907, Carleton College.		
Thomas, Bert Carl.....	Ohio.....	1615 Florida Ave.
Thompson, Oscar.....	Wis.....	1229 15th Street.
Tucker, John Randolph.....	Va.....	417 A Street, S. E.
Tyrer, Arthur James.....	Wash.....	The Albemarle.
Van Vleck, William Cabell.....	D. C.....	719 Quincy Street.
B.A., 1908, The George Washington University.		
White, Herbert William.....	Iowa.....	1700 15th Street.
Ph.B., 1907, Simpson College.		
Wilmer, Edward George.....	Wis.....	308 F Street.
Wyatt, Hardee.....	N. Mex.....	1400 Belmont Street.
B.A., B.S., L.L., 1900, University of Nashville.		
Zirkle, Joseph Claiborne.....	Va.....	837 Shepherd Street.

Master of Laws.

Name.	Legal residence.	City address.
Blanchard, Edwin Clay.....	Va.....	808 Mass. Ave., N. E.
LL.B., 1908, Georgetown University.		
Brown, Forrest Augustus.....	W. Va.....	1700 15th Street.
LL.B., 1909, University of Virginia.		
Calhoun, Clarence Crittenden.....	Ky.....	Evans Building.
M.Dip., 1905, The George Washington University.		
Clements, Elmer Ellsworth.....	N. Dak.....	203 F Street.
LL.B., 1907, Washington College of Law.		
Concepcion y Nava, Severiano....	P. I.....	House of Rep.
B.A., 1902, Colegio Filipino.		
Dickerson, Roy Ernest.....	Colo.....	2517 14th Street.
LL.B., 1909, University of Denver.		
Duer, Leland Blodget.....	Md.....	1720 I Street.
A.B., 1905, LL.B., 1909, Harvard University.		
Edgerton, Frank Eugene.....	Neb.....	412 4th Street, N. E.
A.B., 1900, University of Nebraska.		
LL.B., 1909, The George Washington University.		
Fravel, F. Russell.....	Mass.....	1016 15th Street.
LL.B., 1908, The George Washington University.		
Holmes, Rexford Louie.....	Mo.....	1114 D Street, N. E.
LL.B., 1908, The George Washington University.		
Horn, Oscar Leonard.....	Calif.....	2517 14th Street.
LL.B., 1908, University of Southern California.		
Mapa, Emilio.....	P. I.....	Manila, P. I.
Patterson, Charles Herman.....	N. Y.....	1732 16th Street.
Graduate, 1903, United States Military Academy.		
LL.B., 1909, New York Law School.		
Phair, Philip De Witt.....	Me.....	131 A Street, N. E.
M.A., 1895, Harvard University.		
LL.B., 1909, The George Washington University.		
Phillips, Adon Daniel.....	N. Y.....	3560 11th Street.
B.S., 1906, LL.B., 1908, The George Washington University.		

Master of Patent Law.

Alden, Henry Palmer.....	D. C.....	1308 S Street.
LL.B., 1907, The George Washington University.		
Aveilhé, Mrs. Lillian Brock.....	D. C.....	229 Mass. Ave., N. E.
LL.B., 1905, Washington College of Law.		
Bachmann, Frederick.....	Md.....	1615 Florida Ave.
LL.B., 1909, National University.		
Bohleber, William.....	Ill.....	Patent Office.
LL.B., 1909, National University.		

Name.	Legal residence.	City address.
Cook, Parker.....	N. Y.....	21 8th Street, N. E.
Dennison, Augustus S.....	Wash.....	1931 K Street. LL.B., 1909, National University.
Dorsey, Roscoe John Conklin....	D. C.....	1519 Vermont Ave. LL.B., 1902, LL.M., 1903, Georgetown University. M.Dip., 1907, D.C.L., 1908, The George Washington University.
Gallagher, Laurence Joseph.....	N. Y.....	Patent Office. B.E., 1903, Union College. LL.B., 1909, Georgetown University.
Gilchrist, Walter Schell.....	D. C.....	704 A Street, N. E. A.B., 1902, LL.M., 1908, Georgetown University. LL.B., 1907, The George Washington University.
Halstead, Friend Orin.....	Ind.....	Patent Office. LL.B., 1909, National University.
Houstin, Harry Isaac.....	Ill.....	1248 Irving Street. A.B., 1898, Knox College. LL.B., 1909, Georgetown University.
Kane, John J.....	Mass.....	914 H Street. B.S., 1903, Worcester Polytechnic Institute. LL.B., 1909, Georgetown University.
Kent, Otis Beall.....	Texas.....	The Carolina. LL.B., 1907, LL.M., 1908, Georgetown University.
Lanahan, Henry.....	Md.....	Patent Office. B.A., 1896, Johns Hopkins University. LL.B., 1909, National University.
McDermott, Charles William....	Mass.....	1722 21st Street.
Milburn, Joseph Woodward.....	Md.....	Patent Office. Ph.B., 1902, A.M., 1904, Dickinson College. LL.B., 1909, Georgetown University.
Morgan, Elonzo Tell.....	W. Va.....	1344 Kenyon Street. B.S., 1906, The George Washington University. LL.B., 1908, National University.
Nickel, William Frederick.....	D. C.....	1338 Otis Place. B.S. in E.E., 1909, The George Washington University.
Rockwell, Henry Ensign.....	D. C.....	31 S Street.
Sanderlin, George Bismarck.....	Md.....	509 4th Street. A.B., 1899, A.M., 1900, Wake Forest College. LL.B., 1908, The George Washington University.
Saunders, Marie Katherine.....	Okla.....	The Brunswick. LL.B., 1909, Washington College of Law.
Smith, Harold Elno.....	N. H.....	The Wellington. A.B., 1903, A.M., 1906, Dartmouth College. LL.B., 1908, LL.M., 1909, National University.
Stonebraker, Harold English.....	D. C.....	645 Mass. Ave., N. E. B.S., 1908, The George Washington University.

Name.	Legal residence.	City address.
Styll, Harry Halstead.....	Pa.....	c/o Amer. Optical Co., Southbridge Mass.
L.L.B., 1909, Georgetown University.		
Swenarton, Harold Augustus.....	N. J.....	1538 17th Street.
Ph.B., 1905, Yale University.		
B.L., 1909, The George Washington University.		
Wright, Frederick B.....	N. Y.....	1503 Q Street.
L.L.B., 1888, L.L.M., 1889, Columbia University.		

Special, Patent Law.

Birney, William McDowell.....	D. C.....	1516 22d Street.
L.L.B., 1910, The George Washington University.		
Cohen, Nathan.....	Minn.....	617 K Street.
E.E., 1906, University of Minnesota.		
Edgerton, Frank Eugene.....	Neb.....	412 4th Street, N. E.
A.B., 1900, University of Nebraska.		
L.L.B., 1909, The George Washington University.		
Graff, William Archibald.....	Va.....	1322 Vermont Avenue.
Hellman, Carl A.....	Ill.....	Patent Office.
B.S., 1906, M.S., 1909, University of Illinois.		
Kitselman, Harry Louis.....	Ind.....	The Burlington.
Parsons, Harold Kent.....	Iowa.....	1413 Chapin Street.
Powers, Charles Wallace.....	D. C.....	502 E Street, N. E.
S.B., 1907, Worcester Polytechnic Institute.		
Sheridan, Thomas Harold.....	N. H.....	Y. M. C. A.

Special.

Babcock, Richard Earle.....	D. C.....	707 G Street.
Behrmann, Carl Martin.....	Ill.....	Y. M. C. A.
Bullion, Clarence Leroy.....	Ohio.....	1707 13th Street.
Borchardt, Edwin Montefiore.....	N. Y.....	116 C Street, N. E.
B.S., 1905, Columbia University.		
L.L.B., 1908, New York Law School.		
Calder, Albert Russell.....	Pa.....	1700 15th Street.
Cohen, Abe.....	Wis.....	1322 Vermont Avenue.
Daniel, Benjamin John.....	D. C.....	2441 K Street.
Farmer, James Price.....	D. C.....	154 A Street, N. E.
Flather, Alfred Chester.....	D. C.....	Amer. Security & Trust Co.
Hendley, Albert Julian.....	D. C.....	The New Berne.
Hoover, Frank Willard.....	D. C.....	1824 16th Street.
Koeppler, John Louis.....	Wis.....	The Virginia.
Landick, George, Jr.....	Ind.....	1358 Fairmont Street.
Lerch, John George.....	D. C.....	1520 M Street.
Manghum, James Mason.....	Md.....	1322 R. I. Avenue.

DEPARTMENT OF MEDICINE.

Doctor of Medicine.

First Year.

Name.	Legal residence.	City address.
Abaza, Sulieman Hussain.....	Egypt.....	1416 9th Street.
Clar, Benjamin.....	D. C.....	945 Maryland Ave., S.W.
Cohen, Ralph	D. C.....	618 D Street, N. W.
Dembrosky, William	Russia.....	708 H Street, N. E.
Fortier, Roy McL.....	Cal.....	2310 19th Street, N. W.
Henneberger, Josiah B.....	Md.....	1110 New York Ave.
Ludlow, Clara Southmayd, B.Sc., M.Sc., Ph.D.	Tenn.....	The Ethelhurst, 15th and L Streets.
Riley, Albert Austin.....	Ohio.....	1375 Columbia Road.
Selehaddin, Mouhammed	Turkey.....	Takoma Park, D. C.
Stallings, Clara Laing.....	Md.....	1317 13th Street, N. W.
Stout, Joseph Duerson, A.B.....	D. C.....	1529 8th Street, N. W.
Shea, George Marvin Waite.....	D. C.....	1502 P Street.
Williams, Leslie Shaw.....	D. C.....	128 C Street, N. E.

Second Year.

Borden, Daniel Le Ray.....	D. C.....	1801 California Street.
Bricker, Sacks	D. C.....	200 15th Street, S. E.
Corbett, Sewall Munson.....	Va.....	1700 15th Street, N. W.
Cram, Albert Monroe.....	Vt.....	1611 13th Street.
Calver, George W.....	D. C.....	207 A Street, S. E.
Eckhardt, John Carl.....	D. C.....	1140 18th Street, N. W.
Fitz-Hugh, William De Hart.....	Pa.....	1021 8th Street.
Gray, Augustus Clagett.....	Md.....	G. W. U. Hospital.
Hankins, Harry Gordon.....	S. Africa....	Sibley Hospital.
Hall, Custis Lee.....	D. C.....	1408 Chapin Street.
Helfgott, Max Aaron.....	D. C.....	756 Morton Street.
Hunter, Oscar Benwood.....	Va.....	1305 22d Street.
Knott, Charles O.....	Va.....	1006 I Street, S. E.
Landis, Charles Caldwell.....	Cal.....	1611 13th Street.
La Garde, Louis A., Jr.....	D. C.....	2624 Woodley Place.
Luckett, George Sparr, A.B.....	D. C.....	624 F Street.
Milburn, Frank W.....	Va.....	1319 Vermont Ave.
Pagan, Albert Elwood.....	D. C.....	1965 Biltmore Street.
Read, Boyd R.....	D. C.....	1819 N. Capitol Street.

Name.	Legal residence.	City address.
Rollings, John Adolph.....	Va.....	1143 22d Street.
Scarito, Nicholas J.....	D. C.....	1021 8th Street, N. W.
Sloat, Jesse Irving.....	D. C.....	23 1st Street, N. E.
Schaub, Gustavus A.....	Texas.....	Apt. 66, The Plymouth.
Travis, John Randolph.....	Va.....	1234 Mass. Ave.

Third Year.

Baum, Ewald George.....	Mass.....	Children's Hospital.
Bailey, William Otis.....	S. C.....	1217 N Street, N. W.
Brewer, Gilbert Roscoe.....	Ill.....	2439 N Street, N. W.
Brock, Charles Le Roy.....	D. C.....	1912 9th Street.
Burnett, Roy E., B.S.....	Okla.....	1307 R Street.
Castleman, Philip	Mass.....	Dept. of Agriculture.
Christiansen, Elmer E.....	Utah.....	937 H Street, N. W.
Cox, Clem	W. Va.....	1320 11th Street.
Crane, Charles George, B.S.....	N. J.....	1307 R Street, N. W.
Downey, Alice W.....	D. C.....	2473 18th Street.
Dyer, John Christopher.....	Ohio.....	1225 B Street, N. E.
Eisenberg, Arthur A., A.B.....	D. C.....	1213 4½ Street, S. W.
Ellison, Everett Monroe, A.B., A.M.	Tenn.....	Y. M. C. A.
Eppard, George I.....	Va.....	1921 G Street, N. W.
Fisher, Charles A.....	D. C.....	1307 R Street.
Hayton, Charles Henry, A.B.....	S. Africa.....	Takoma Park, D. C.
Hunt, Isaac Burton.....	D. C.....	702 H Street, N. W.
Irmén, Felix Arnold.....	D. C.....	Tuberculosis Hospital.
Jaeger, Henry W.....	D. C.....	15 4th Street, S. E.
Kemeys, William	D. C.....	1633 29th Street.
Leonard, George Ferree, A.B.....	N. C.....	1220 N Street, N. W.
Martin, Aaron Wise.....	N. C.....	1833 K Street.
Molzahn, Albert John, B.S.....	Neb.....	Sibley Hospital.
Mooers, Harold Alonzo.....	D. C.....	Takoma Park, D. C.
Oliver, Harry Waterhouse.....	N. D.....	1204 K Street.
Paige, Wendell A. H.....	Vt.....	1444 Rhode Island Ave.
Pitt, Richard V.....	Va.....	Mt. Vernon Apts.
Read, Effie Alberta, Ph.D.....	Mass.....	Dept. of Agriculture.
Ralph, Charles Edward.....	D. C.....	406 11th Street, N. E.
Smith, Arthur C.....	N. Y.....	1340 New York Ave.
Williams, Robert C., A.B.....	N. C.....	1208 M Street.
Williams, Timothy G.....	N. C.....	1236 13th Street.
Zimmerman, Carl George.....	N. Y.....	1340 New York Ave.

Fourth Year.

Name.	Legal residence.	City address.
Andrews, Laurin Lundy, A.B.	Kans.	1311 13th Street, N. W.
Arnold, Clement M.	Ohio	1444 Rhode Island Ave.
Bales, Ernest N., Ph.D.	Cal.	Aud. Office, P. O. Dept.
Chichester, Harry Denison	Texas	1012 13th Street.
Davis, George von Pullinger	Pa.	906 S Street, N. W.
Duenner, Robert Henry	Tenn.	1700 15th Street, N. W.
Elliott, Lee Louis	N. Y.	G. W. U. Hospital.
Eldridge, Watson W., Jr.	Mich.	316 Md. Ave., N. E.
Fetzer, Lewis William	N. Y.	2004 4th Street, N. E.
Frey, John Paul	D. C.	1224 30th Street, N. W.
Goss, Audrey, A.B.	Kans.	1443 Mass. Ave.
Hoover, George William, M.S.	Okla.	Bureau of Chem., U. S. Dept. of Agriculture.
Herring, Katherine M.	Iowa	1309 H Street.
Hornaday, Frank A., B.S.	Texas	1310 N. C. Ave., N. E.
Huntington, William H.	Conn.	2330 Mass. Ave.
Klingerman, George Eliot	Pa.	1528 9th Street, N. W.
Kerby, James Philip	Md.	2606 L Street, N. W.
Kinner, Jesse Lee	N. Y.	Sibley Hospital.
Lewis, Harry Samuel	D. C.	54 I Street, N. W.
Loop, Floyd Addison	Pa.	1507 Columbia Street.
Machler, Francis Patrick	Ill.	1236 11th Street.
McLoone, John J., A.B., Phar.D.	Pa.	717 H Street, N. W.
McMillan, Walter Alexis	S. C.	1317 F Street, N. W.
Mata, Carlos	Cent. Am.	621 H Street, N. W.
Morian, Clarence Herbert	Pa.	1444 Rhode Island Ave.
Nelson, Nesmith	Minn.	23 Rhode Island Ave.
Neville, James Alan	Neb.	1212 Mass. Ave.
Peyton, Harry Alexander	Miss.	1744 Riggs Street, N. W.
Price, Walter	D. C.	438 N. J. Ave., S. E.
Ross, Erwin Worth	N. C.	1700 15th Street, N. W.
Sorensen, Antone Christian	Utah	1115 E Street, N. W.
Sullivan, James F.	D. C.	212 N. Capitol Street.
Tibbets, Albert Perkins, A.B.	N. H.	Casualty Hospital.
Titus, Elijah White, Phar.D.	Va.	Children's Hospital.
Weidemann, Clarence Conrad	D. C.	1237 Girard Street, N.W.
White, Lyle Charles	Ohio	No. 16, The Stanhope.
Waller, Clifford Ellison	Texas	1340 New York Ave.
Willis, Harry Clay	N. C.	932 K Street, N. W.
Young, Clifton Eugene	D. C.	2509 Wisconsin Ave.

Special Students.

Name.	Legal residence.	City address.
Baxter, James H., M.D.....	Ga.....	Dept. of Agriculture.
Burritt, Alice	D. C.....	The Cliffborne.
Brighthouse, Henrietta E., M.D.....	Cal.....	Takoma Park, D. C.
Dyer, D. C., Ph.D.....	D. C.....	1330 Columbia Road.
Lynch, William Duncan, S.B....	Mass.....	30 Grant Place, N. W.
Skinner, William W., B.S., M.S..	Md.....	Bureau of Chem., U. S. Dept. of Agriculture.

Summary.

CANDIDATES FOR THE M.D. DEGREES:

First year.....	13
Second year.....	24
Third year.....	33
Fourth year.....	39
SPECIAL STUDENTS.....	6

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DEPARTMENT OF DENTISTRY.

Doctor of Dental Surgery.

First Year.

Name.	Legal residence.	City address.
Angelo, Stuart Miller.....	D. C.....	124 Seaton Street.
Bingman, Harry.....	Pa.....	617 Morris Street, N. E.
Bingham, Gustavus A.....	N. C.....	14 I Street, N. E.
Camalier, Caleb Willard.....	D. C.....	28 Quincy Place, N. E.
Durfee, Claude.....	Ill.....	136 D Street, S. E.
Fansler, Orville Newton.....	Neb.....	Dept. of Agriculture.
Freeman, Ezra A.....	N. Y.....	2910 13th Street.
Fowler, Robert Clinton.....	D. C.....	710 10th Street, S. E.
Hodgkin, James Orlando.....	Va.....	1000 9th Street.
Hodgkin, William Newton.....	Va.....	1000 9th Street.
Nall, Maurice.....	N. Y.....	711 G Street.
Michaels, M. Manly.....	D. C.....	Bureau of Statistics, Agricultural Dept.
Rubira, Alfredo.....	S. A.....	739 13th Street.
Spillan, Henry Merle.....	N. Y.....	2031 13th Street.
Thacker, Althea E.....	Ill.....	1920 16th Street.
Zepp, W. Clarence.....	N. J.....	C/o Ogram's Drug Store.

Second Year.

Name.	Legal residence.	City address.
Beera, Lloyd Y.....	Pa.....	1530 3d Street.
McCausland, John.....	Pa.....	1506 Caroline Street.
Sandoval, Domiciano J.....	P. I.....	726 12th Street.
Stone, Eugene R.....	Wis.....	1810 G Street.
Wood, Homer E.....	D. C.....	512 B Street, N. E.

Third Year.

Butterfield, Louie Watson.....	Iowa.....	229 P Street.
Eslin, Melville P.....	D. C.....	Westory Building.
Hoffman, Thomas.....	Mass.....	1115 6th Street.
Hurwitz, Maurice.....	Mass.....	1115 6th Street.
Robinson, James Norris.....	W. Va.....	314 2d Street, N. E.
Sherfy, Raphael.....	Pa.....	3019 11th Street.

Special.

West, B. R.....	Pa.....	905 13th Street.
D.D.S., 1903, Philadelphia Dental College.		

Summary.

CANDIDATES FOR D.D.S. DEGREE:

First year.....	16
Second year.....	5
Third year.....	6
Special	1
	— 28

THE ASSOCIATED COLLEGES.

COLLEGE OF PHARMACY.

Doctor of Pharmacy.

Freshmen.

Name.	Legal residence.	City address.
Allen, E. W.	D. C.	479 G Street, S. W.
Anderson, Miss Grace L.	Mo.	1721 21st Street, N. W.
Buchanan, Clyde	N. C.	214 14½ Street, N. E.
Burke, C. W.	New Mex.	1748 7th Street, N. W.
Barker, C. M.	Calif.	P. O. Dept., Room 407.
Bennett, H. M.	Okla.	1818 14th Street, N. W.
Buck, W. De H.	Md.	727 6th Street, N. E.
Brown, B. S.	Va.	1426 Corcoran St., N. W.
Costello, A.	N. Y.	473 H Street, N. W.
Day, H. L.	D. C.	1730 H Street, N. W.
Ennis, R. O.	D. C.	20 7th Street, S. E.
Elliott, Mrs. E. T.	Mich.	201 Md. Ave., N. E.
Garber, John A.	Md.	Westminster, Md.
Gorsuch, A. F.	D. C.	812 A Street, S. E.
Hammer, E. R.	D. C.	1343 S. Capitol Street.
Henry, C. W.	N. C.	22d & N Streets, N. W.
Huppmann, C.	D. C.	338 I Street, S. W.
Lewis, E. H.	D. C.	1742 R Street, N. W.
Luckett, D. G.	D. C.	The Huntington.
Lee, M.	Va.	831 N. Capitol Street.
Morgan, M. W.	Md.	Box 127, Bethesda, Md.
Mayo, R.	N. C.	1115 5th Street, N. W.
Nolan, T. A.	D. C.	1164 5th Street, N. E.
Schweinhaut, T. F.	D. C.	329 Linworth Pl., S. W.
Smith L. Douglas	Va.	115 Saeftred Street, Alexandria, Va.
Smyser, B. A.	Pa.	715 I Street, S. E.
Stewart, J. C.	Pa.	127 3d Street, N. E.
Swann, E. G.	Md.	Naval Med. School Hospital, D. C.
Thyson, L. G.	D. C.	2405 15th Street, N. W.
Walker, F. W.	Va.	1358 Girard Street, N. W.
Welland, Geo. A.	D. C.	21 N Street, N. W.
Wight, F. L.	Va.	1329 F Street, N. E.

Juniors.

Name.	Legal residence.	City address.
Boyer, W. D.	Md.	1748 8th Street, N. W.
Butler, H. K.	Md.	1001 E Street, S. E.
Beeson, L. W.	Iowa.	664 Mass. Ave., N. E.
Conrad, C. T.	D. C.	819 N. C. Ave., S. E.
Dammeyer, C. F. W.	Md.	112 11th Street, N. E.
Feller, F. M.	Va.	1335 Q Street, N. W.
Grubbs L. R.	Md.	76 I Street, N. W.
Gass, C. B.	Md.	1100 14th Street, N. W.
Hardey, J. C.	Md.	607 G Street, S. W.
Henderson, C. W.	Va.	1415 Ames Place, N. E.
Henderson, W. K.	Va.	217 14th Street, N. E.
Hohberger, S. J.	Md.	65 R. I. Ave., N. W.
Joachim, A. B.	D. C.	720 6th Street, N. W.
Jenkins, L. J.	Va.	902 E. Capitol Street.
Marsden, F. B.	D. C.	1731 1st Street, N. W.
Norton, W. H.	Wash.	136 6th Street, N. E.
Nelson, Miss Gail E., B.S.	Okla.	1st & C Streets, N. W.
Rosseter, J. W.	D. C.	805 7th Street, N. E.
Schommer, J. B., LL.B.	Wis.	1 R Street, N. E.
Snyder, C. F.	D. C.	3111 16th Street, N. W.
Whitebread, C.	Wis.	748 Gresham Pl., N. W.

Seniors.

Boyd, Geo. W.	D. C.	121 2d Street, N. E.
Elvove Elias, B.S&M.S.	Pa.	Box 2304, Sta. G, D. C.
Feller, R. W.	Va.	1335 Q Street, N. W.
Gill, T. L.	Va.	9th and P Streets, N. W.
Harbaugh, L. M.	D. C.	1375 Emerson St., N. W.
Hogan, J. D. A.	D. C.	19 7th Street, N. E.
Hughes, H. D.	D. C.	1325 29th Street, N. W.
Hanback, C. L.	Va.	48 N. Y. Ave., N. E.
Judd, R. A.	D. C.	601 7th Street, S. E.
Jones, W. S.	Va.	1509 Irving Street, N. W.
Kenner, A. W.	Mass.	1711 17th Street, N. W.
Milburn, F. W.	Va.	1319 Vt. Ave., N. W.
Morgan, J. H.	Md.	Box 127, Bethesda, Md.
Nolan, J. I.	Ill.	1164 5th Street, N. E.
Peters, D. B.	Va.	Sub-Station L, D. C.
Plunkett, P. E.	Md.	1646 Irving Street, N. W.
Payne, D. B.	Va.	639 Md. Ave., N. E.

Name.	Legal residence.	City address.
Richardson, Miss N. E.	D. C.	1322 Q Street, N. W.
Richardson, Miss M. H.	Ohio	1333 Columbia Rd., N. W.
Strobel, Miss J. H.	D. C.	16 R Street, N. W.
Senay, H. P.	D. C.	601 H Street, N. E.
Salb, Geo. R.	D. C.	617 9th Street, N. E.
Tschiffely, D.	Md.	475 Penna. Ave., N. W.
Thibadeau, R. B.	Ga.	318 N. Y. Ave., N. W.
Tewksbury, M. B.	Kan.	16 3d Street, S. E.
Wilson, E. F.	Del.	1718 Corcoran St., N. W.

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Special.

Broomell, A. W., A.B.	Va.	723 9th Street, N. W.
Boughton, E. W., M.A.	N. Y.	Bureau of Chem., Agri- cultural Dept.
Clime, W. S.	Pa.	Bureau of Chem., Agri- cultural Dept.
Dodge, C. O., B.S.	N. H.	1329 11th Street, N. W.
Mix, Miss Anna E.	Md.	113 Md. Ave., N. E.
Rogers, J. S., B.S.	N. Y.	1771 T Street, N. W.
Wilson, C. P., B.S.	Del.	Bureau of Chem., Agri- cultural Dept.

Summary.**CANDIDATES FOR THE PHAR.D. DEGREE:**

Freshmen	32
Junior	21
Senior	26
Special	7

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COLLEGE OF VETERINARY MEDICINE.**Doctor of Veterinary Medicine.****First Year.**

Name.	Legal residence.	City address.
Ayers, A. T.	D. C.	P. M. G. Dept., War Dept.
Benjamin, F. H.	D. C.	204, Y. M. C. A.
Buchanan, J. Wesley	D. C.	502 M Street.
Clayton, H. T.	Mo.	U. S. Treasury.
Earl, W. B.	D. C.	Navy Dept.

Name.	Legal residence.	City address.
Fake, C. T.....	N. Y.....	1732 21st Street, N. W.
Hammer, Orrin O.....	Va.....	Alexandria, Va.
Hodge, J. E.....	D. C.....	225 H Street, N. W.
Holt, C. L.....	Tex.....	Room 259, War Dept.
Lochboehler, H. A.....	Nebr.....	414 R Street, N. W.
Marsh, Hadleigh.....	D. C.....	3430 Brown Street.
Morcock, J. E.....	Ga.....	23 Q Street, N. E.
McClure, F. I.....	Pa.....	1332 W Street, N. W.
McClure, F. K.....	Pa.....	1332 W Street, N. W.
Perrin, Edwin R.....	Mich.....	1332 W Street, N. W.
Smith, Jesse K.....	Ariz.....	U. S. Treasury.
Stahl, B. M.....	D. C.....	1108 N. Capitol Street.

Second Year.

Brett, George Wesley.....	Mass.....	2117 O Street, N. W.
Chamberlain, J. F.....	Mass.....	
Cotton, William E.....	Iowa.....	3242 38th Street, N. W.
Dillard, William E.....	Va.....	Agricultural Dept.
Divine, John P.....	Ark.....	1463 Florida Ave., N. W.
Fry, William H.....	D. C.....	608 N. Carolina Ave.
Franz, J. Louis.....	Wis.....	Y. M. C. A.
Graybill, Harry W.....	Iowa.....	1828 15th Street, N. W.
Graham, Charles R.....	Pa.....	1826 9th Street, N. W.
Grubb, Chauncy R.....	Md.....	2320 Ontario Road.
Hornbaker, Joseph N.....	Va.....	1415 Monroe St., N. W.
Hugins, Frank A.....	Mass.....	1355 Spring Road, N. W.
Hicks, Tunis.....	Mich.....	621½ Park Road.
Hicks, Greydon St. C.....	Mich.....	621½ Park Road.
Humphrey, Charles W.....	Pa.....	327 Penna. Ave., S. E.
Koon, George H.....	Ohio.....	2320 Ontario Road.
Kushner, Albert.....	Md.....	2115 14th Street, N. W.
Lowry, William B.....	D. C.....	1827 6th Street, N. W.
Miller, E. W.....	Va.....	1330 W Street, N. W.
Moore, Charles S.....	Mich.....	2323 University Pl., N. W.
Maher, William A.....	Va.....	220 12th Street, S. E.
McCarthy, Henry J.....	Md.....	304 H Street, N. W.
O'Hara, William H.....	Wis.....	2414 N. Capitol Street.
Plunkert, Charles M.....	D. C.....	435 O Street, N. W.
Riley, Edward H.....	Okla.....	B. A. I., Agr'l Dept.
Shore, Howard J.....	N. C.....	B. A. I., Agr'l Dept.
Smith, R. Hamilton.....	D. C.....	1735 Willard Street.
White, George E.....	Mass.....	323 East Capitol Street.

GEOGRAPHICAL DISTRIBUTION OF STUDENTS OF THE UNIVERSITY AND THE ASSOCIATED COLLEGES.

Alabama	2	Pennsylvania	71
Arizona	3	Rhode Island.....	4
Arkansas	4	South Carolina.....	7
California	11	South Dakota.....	7
Colorado	1	Tennessee	13
Connecticut	8	Texas	13
Delaware	9	Utah	6
District of Columbia.....	553	Vermont	6
Florida	5	Virginia	78
Georgia	10	Washington	9
Idaho	4	West Virginia.....	13
Illinois	40	Wisconsin	23
Indiana	17	Australia	1
Iowa	23	Canada	1
Kansas	11	Central America.....	1
Kentucky	14	China	6
Louisiana	5	Cuba	4
Maine	10	Denmark	1
Maryland	92	Ecuador	2
Massachusetts	49	Egypt	1
Michigan	20	England	1
Minnesota	14	France	2
Mississippi	4	Germany	1
Missouri	19	Greece	1
Nebraska	11	Java	1
New Hampshire.....	9	Russia	2
New Jersey.....	15	Mexico	1
New Mexico.....	3	Philippine Islands.....	9
New York.....	60	Servia	1
North Carolina.....	21	South Africa.....	2
North Dakota.....	4	Turkey	1
Ohio	38	Uruguay	1
Oklahoma	4		
Oregon	4		
			1,387

RECAPITULATION.

MEMBERS OF FACULTY AND TEACHING STAFF OF THE UNIVERSITY AND THE
ASSOCIATED COLLEGES :

Professors	70
Associate Professors	8
Assistant Professors	24
Associates, Instructors, Demonstrators, and Assistants....	72
Lecturers	15
<hr/>	
Total.....	189

STUDENTS.

DEPARTMENT OF ARTS AND SCIENCES :

Faculty of Graduate Studies.....	90
College of Arts and Sciences.....	305
College of Engineering and Mechanic Arts.....	180
College of the Political Sciences.....	64
Teachers' College	86
Division of Architecture.....	74
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	799

PROFESSIONAL DEPARTMENTS :

Department of Law.....	333
Department of Medicine.....	115
Department of Dentistry.....	28
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	476

ASSOCIATED COLLEGES :

National College of Pharmacy.....	86
College of Veterinary Medicine.....	45
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	131

Total.....	1,406
Duplicates	19
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Total.....	1,387

Degrees Conferred.

DEGREES CONFERRED AT FALL CONVOCATION, 1909. IN COURSE.

Bachelor of Arts.

James Houston Shrader, District of Columbia.

Master of Science.

John Aldum Sterrett, District of Columbia.

B.S., 1908, The George Washington University.

Doctor of Medicine.

Abner Beebe Dunn, Pennsylvania.

Bachelor of Laws.

Antonio Cornelius Gonzalez, Jr., New York.

Frank Schley Hemmick, District of Columbia.

(With Distinction.)

DEGREES CONFERRED AT WINTER CONVOCATION, 1910. IN COURSE.

Bachelor of Arts.

Oscar Henry William Carlson, Pennsylvania.

Coe Aloysius McKenna, Oregon.

Silas Wesley Rogers, Arkansas.

LL.B., 1906, University of Arkansas.

Civil Engineer.

Raymond Edmond Adams, Pennsylvania.

B.S. in C.E., 1909, The George Washington University.

Master of Arts.

Alice Maud Barbour, Connecticut.

B.S., 1893, Wellesley College.

Wesley Frost, Kentucky.

A.B., 1907, Oberlin College.

Theodore Cushing Hamm, California.

B.A., 1904, University of Colorado.

Butler Black Hare, South Carolina.

A.B., 1899, Newberry College.

Bachelor of Laws.

William McDowell Birney, District of Columbia.

Walter Clayton Carpenter, Rhode Island.

Ph.B., 1906, Brown University.

Heath Sutherland, Connecticut.

(As of the Class of 1890.)

DEGREES CONFERRED AT COMMENCEMENT, 1910.**IN COURSE.****Doctor of Philosophy.**

August Friedrich Wilhelm Edler, Germany.

A.B., 1906, A.M., 1907, M.Dip., 1908, The George Washington University.

James Henry Gardner, Kentucky.

B.S., 1900, M.S., 1906, Kentucky State College.

Herbert Harvey Kimball, New Hampshire.

B.S., 1884, New Hampshire College of Agriculture and Mechanic Arts.

M.S., 1900, Columbian University.

William Thomas Shepherd, Arkansas.

B.Sc., 1899, Ph.D., 1901, Gale College.

A.M., 1905, M.S., 1906, Oklahoma State University.

Master of Arts.

John St. Clair Brookes, Jr., District of Columbia.

A.B., 1907, The George Washington University.

Edward Cullom, Tennessee.

A.B., 1904, University of Nashville.

Mary Walter Drummond, District of Columbia.

A.B., 1905, Woman's College of Baltimore.

(With Teacher's Diploma.)

Howard Colwell Hopson, Wisconsin.

A.B., 1908, The George Washington University.

Coe Aloysius McKenna, Oregon.

A.B., 1910, The George Washington University.

Justin Frank Seiler, Ohio.

A.B., 1908, The George Washington University.

Rhoda Watkins, Pennsylvania.

A.B., 1906, The George Washington University.

Emilie Margaret White, District of Columbia.

A.B., 1907, The George Washington University.

Electrical Engineer.

Sydney Marquis, South Dakota.

B.S., 1909, South Dakota State College.

Bachelor of Arts.

- David Alphonse Baer, District of Columbia.
Agnes McGrew Balloch, District of Columbia.
(With Distinction.)
C. Maurice Barnes, Virginia.
Corinne Elizabeth Brackett, District of Columbia.
Elizabeth Virginia Brown, District of Columbia.
Henry Culbertson Clark, District of Columbia.
Linda Lee Clift, District of Columbia.
David Ransom Covell, District of Columbia.
Rena Preston Davis, District of Columbia.
(With Distinction.)
Ruth Millicent Denham, District of Columbia.
Ernest Risley Eaton, Australia.
Arthur Alexander Eisenberg, District of Columbia.
Esther Foster, District of Columbia.
Zaidee Janet Garr, Georgia.
Harry Kemp Griffin, Illinois.
Charles Henry Hayton, South Africa.
Edwin Le Fevre, Ohio.
M.D., 1885, Howard University.
Woislav Petrovitch, Servia.
Joseph Plass, Germany.
John Joseph Rives, District of Columbia.
Ernst Otto Schreiber, Jr., District of Columbia.
(With Distinction.)
John Millard Simpson, District of Columbia.
Joseph Duerson Stout, District of Columbia.
Ruth Wilson, District of Columbia.

Bachelor of Arts and Teacher's Diploma.

- Jane Brookfield Edward Brown, District of Columbia.
Kate May Estey, District of Columbia.
M. Ella Given, District of Columbia.
Charles Hart, District of Columbia.
Jeanne Maret, France.
M. Ella Morgan, District of Columbia.
Lily Aurelia Ross, Missouri.

Bachelor of Science.

- Levietta Ruth Alden, District of Columbia.
Nila Frances Allen, Indiana.
Aubrey Vail Fuller, District of Columbia.

Lilian Theresa Hathaway, Ohio.
 Allen Johnson Marsh, Ohio.
 Margaret Randolph Taylor, District of Columbia.

Bachelor of Science in Chemistry.

Will Beck Meyer, District of Columbia.

Bachelor of Science in Civil Engineering.

Marion Gilbert Donk, Florida.
 George Herbert Guerdrum, District of Columbia.
 Glenn Rupert Lawrence, District of Columbia.
 (With Distinction.)
 Martin John McPike, Pennsylvania.
 Irving Randolph Saum, District of Columbia.
 Joseph Henry Waters, District of Columbia.

Bachelor of Science in Electrical Engineering.

Thomas R. Gwinn, District of Columbia.
 Hoxsie Yost Smith, District of Columbia.
 Ernest Ferdinand Wenderoth, New York.

Bachelor of Science in Architecture.

Harry Talfourd Frost, Ohio.

Master of Diplomacy.

Eustacio Segundo Ilustre, Philippine Islands.
 L.L.B., 1908, The George Washington University.
 Ely Eliot Palmer, Rhode Island.
 A.B., 1908, Brown University.
 De Witt Clinton Poole, Jr., Illinois.
 A.B., 1906, University of Wisconsin.

Doctor of Medicine.

Laurin Lundy Andrews, Kansas.
 A.B., 1908, Kansas University.
 Harry Denison Chichester, Texas.
 George Von Pullinger Davis, Pennsylvania.
 Robert Henry Duenner, Tennessee.
 Watson William Eldridge, Jr., Michigan.
 Leo Louis Elliott, New York.
 John Paul Frey, District of Columbia.
 Frank Adelbert Hornaday, Texas.
 B.S., 1907, The George Washington University.

George William Hoover, Oklahoma.

M.S., 1906, The George Washington University.

William Henry Huntington, Connecticut.

James Philip Kerby, Maryland.

Jesse Lee Kinner, New York.

George Elliott Klingerman, Pennsylvania.

Harry Samuel Lewis, District of Columbia.

Floyd Addison Loop, Pennsylvania.

(With Distinction.)

Francis Patrick Machler, Illinois.

John Joseph McLoone, Pennsylvania.

A.B., 1905, Catholic University.

Louis Antony Micheloni, Italy.

James Alan Neville, Nebraska.

Harry Alexander Peyton, Pennsylvania.

Walter Price, District of Columbia.

Erwin Worth Ross, North Carolina.

Albert Perkins Tibbets, New Hampshire.

A.B., 1908, The George Washington University.

Elijah White Titus, Virginia.

Phar.D., 1906, The George Washington University.

Clifford Ellison Waller, Texas.

Lyle Charles White, Ohio.

Clifton Eugene Young, District of Columbia.

Doctor of Dental Surgery.

Louie Watson Butterfield, Iowa.

Melville Palmer Eslin, District of Columbia.

Thomas Hoffman, Massachusetts.

Maurice Hurwitz, Massachusetts.

James Norris Robinson, West Virginia.

Raphael Sherfy, Pennsylvania.

Robert Finley Truett, Kentucky.

Doctor of Pharmacy.

George W. F. Boyd, District of Columbia.

Elias Elvove, District of Columbia.

John D. A. Hogan, District of Columbia.

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David A. Peters, Virginia.

Paul Eugene Plunkett, Maryland.

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 Naomi Elizabeth Richardson, District of Columbia.
 Julia Henry Strobel, District of Columbia.
 Melville Brainard Tewksbury, Kansas.
 Douglas Tschiffely, Maryland.

Master of Laws.

Forrest Augustus Brown, West Virginia.
 LL.B., 1909, University of Virginia.
 Roy Ernest Dickerson, Colorado.
 LL.B., 1909, University of Denver.
 Frank Eugene Edgerton, Nebraska.
 A.B., 1900, University of Nebraska.
 LL.B., 1909, The George Washington University.
 Rexford Louie Holmes, Missouri.
 LL.B., 1908, The George Washington University.
 Emilio Mapa, Philippine Islands.

Master of Patent Law.

Henry Palmer Alden, District of Columbia.
 LL.B., 1907, The George Washington University.
 Frederick Bachmann, Maryland.
 LL.B., 1909, National University.
 William McDowell Birney, District of Columbia.
 LL.B., 1910, The George Washington University.
 William Bohleber, Illinois.
 LL.B., 1909, National University.
 Parker Cook, New York.
 Augustus Seymour Dennison, Washington.
 LL.B., 1909, National University.
 Roscoe John Conklin Dorsey, District of Columbia.
 LL.B., 1902, LL.M., 1903, Georgetown University.
 M.Dip., 1907, D.C.L., 1908, The George Washington University.
 Laurence Joseph Gallagher, New York.
 B.E., 1903, Union College.
 LL.B., 1909, Georgetown University.
 Walter Schell Gilchrist, District of Columbia.
 A.B., 1902, LL.M., 1908, Georgetown University.
 LL.B., 1907, The George Washington University.
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 LL.B., 1909, National University.
 Harry Isaac Houston, Illinois.
 A.B., 1898, Knox College.
 LL.B., 1909, Georgetown University.
 John J. Kane, Massachusetts.
 B.S., 1905, Worcester Polytechnic Institute.
 LL.B., 1909, Georgetown University.

Otis Beall Kent, Texas.

LL.B., 1907, LL.M., 1908, Georgetown University.

Henry Lanahan, Maryland.

A.B., 1896, Johns Hopkins University.

LL.B., 1900, National University.

Charles William McDermott, Massachusetts.

Joseph Woodward Milburn, Maryland.

Ph.B., 1902, A.M., 1904, Dickinson College.

LL.B., 1909, Georgetown University.

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B.S., 1906, The George Washington University.

LL.B., 1908, National University.

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B.S. in E.E., 1909, The George Washington University.

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LL.B., 1909, Washington College of Law.

George Bismarck Sanderlin, Maryland.

A.B., 1899, A.M., 1900, Wake Forest College.

LL.B., 1908, The George Washington University.

Harold Elno Smith, New Hampshire.

A.B., 1903, A.M., 1906, Dartmouth College.

LL.B., 1908, LL.M., 1909, National University.

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B.S., 1908, The George Washington University.

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LL.B., 1909, Georgetown University.

Harold Augustus Swenarton, New Jersey.

Ph.B., 1905, Yale University.

B.L., 1909, The George Washington University.

Bachelor of Laws.

James Frank Allee, Jr., Delaware.

Henry Llewellyn Barrick, Nebraska.

Charles Frederick Black, Vermont.

Ph. B., 1907, University of Vermont.

William Gordon Brantley, Jr., Georgia.

A.B., 1907, University of Georgia.

Philip Barraud Campbell, District of Columbia.

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Frank Farnsworth Ford, Michigan.

Clyde Davis Garrett, District of Columbia.

Edward Percy Gates, District of Columbia.

A.B., 1908, The George Washington University.

William Archibald Graff, Virginia.

Pleasant Fowler Graves, Texas.

Ph.B., 1905, Southwestern University.

Lyle Hubbard, Iowa.

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William Wyatt Simmons, Mississippi.

A.B., 1905, Mississippi College.

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Kenneth Taylor, Minnesota.

B.S., 1907, Carleton College.

(With distinction.)

John Randolph Tucker, Virginia.

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Bachelor of Law.

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A.B., 1907, Bowdoin College.

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A.B., 1908, The George Washington University.

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Bert Carl Thomas, Ohio.

Doctors of Philosophy.

During the years 1894 to 1910, inclusive, the University has conferred the degree of Doctor of Philosophy, after examination and the presentation and public defense of a thesis, upon the following persons:

1894.

- *Edward Farquhar,** (Greek)
Thesis: Elements of Unity in the Homeric Poems. (Conservative Review, vol. iii, June-September, 1900.)
- Walter Scott Harshman,** (Theoretical Astronomy)
M.S., 1892, Columbian University.
Thesis: Investigation of the Motion of the Pericentre of Deimos. (Astronomical Journal, Boston, vol. xiv, pp. 145-148, 1894.)
- Professor Frank Hall Knowlton,** (Botany)
B.S., 1884, M.S., 1887, Middlebury.
Thesis: The Flora of the Laramie Group and Allied Formations. (Not published.)
- Claude Augustus Oscar Rosell,** (Chemistry)
M.A., 1881, University of Pennsylvania; LL.B., 1886, Georgetown University.
Thesis: Investigation of the Properties of Ferric Acid. (J. Am. Chem. Soc., vol. xvii, pp. 760-769, 1895.)

1895.

- George Wesley Hamner,** (History)
B.A., 1882, M.A., Hiawassee College; LL.B., 1885, University of Alabama; LL.M., 1886, Georgetown University.
Thesis: Researches upon the Government of the Creek Indians. (Not published.)

1896.

- Edward Clark Hudson,** (Greek)
B.A., 1884, M.A., 1894, Hiawassee College; M.A., 1894, Columbian University.
Thesis: Investigation into the Use of the Genitive Case in Greek. (Not published.)
- Rev. James Stephen Lemon,** (Psycho-physics)
B.A., 1864, M.A., 1867, Wesleyan University, Middletown, Conn.
Thesis: The Skin Considered as an Organ of Sensation. (Published separately, 1898, 70 pp.)

1897.

- Professor Charles Arthur Hollick,** (Palæobotany)
Ph.D., 1879, Columbia College.
Thesis: Palæobotany of the Yellow Gravel at Bridgeton, N. J. (Not published.)

* Deceased.

John Scott Johnson, (Philosophy)
B.S., 1893, M.A., 1894, Columbian University.
Thesis: The Influence of French Thought on the Formation of the Constitution of the United States. (Not published.)

Timothy William Stanton, (Palaeontology)
B.S., 1883, M.S., 1895, University of Colorado.
Thesis: A Comparative Study of the Lower Crataceous Formation and Faunas of the United States. (Jour. of Geology, pp. 1-49, September-October, 1897.)

1898.

*Cabell Whitehead, (Chemistry)
B.M., 1885, Lehigh University; M.S., 1895, Columbian University.
Thesis: A Study of the Tellurides: Their Formation and Chemical Properties. (G. W. U. Bull., 5 [4], 65-68, 1906.)

1900.

Eugene A. Byrnes, (Physical Chemistry)
B.A., 1884, Michigan University; LL.B., 1887, LL.M., 1888, Columbian University.
Thesis: Experiments on the Direct Conversion of the Energy of Carbon into Electrical Energy. (1, "Voltaic Cells with Fused Electrolytes"; 2, "Notes on Metallic Diaphragms." Trans. Amer. Electrochemical Society. Vol. 2, pp. 113-121. Vol. 4, p. 135.)

Rev. Benjamin Alfred Dumm, (Philosophy)
B.A., 1886, M.A., 1889, Western Maryland College.
Thesis: The Concept of Self in the Analysis of Experience. (Not published.)

Professor Charles Russell Ely, (Chemistry)
A.B., 1891, A.M., 1897, Yale College.
Thesis: Investigation of the Phenomenon of Deliquescence and the Capacity of Salts to Attract Water Vapor. (G. W. U. Bull., 5 [4], 69-74, 1906.)

Ernestine Fireman, (Chemistry)
M.S., 1898, Columbian University.
Thesis: The Action of Phosphonium Iodide on Tetra and Penta Chlorides. (Am. Chem. Jour., 30, 116-133, 1903.)

Charles Moore, (American History)
A.B., Harvard; M.A., 1898, Columbian University.
Thesis: The Northwest under Three Flags. (Published separately by Harper & Bros., New York, 1900, 402 pp.)

1901.

William Hamilton, (American History)
B.A., 1891, Moravian College, Pennsylvania; M.A., 1894, Columbian University.
Thesis: The Expansion of Russia to the Eastward. (Not published.)

Chohei Shirasu, (Economics)
Graduate, 1893, Doshisha University, Japan; A.M., 1899, Yale University.
Thesis: The Development of Commerce in Japan and its Effect on Civilization. (Summary of Commerce and Finance for December, 1901, Bureau of Statistics, U. S. Treasury Department, pp. 227-2315.)

* Deceased.

1902.

- Rev. Frank Leighton Day, (Anthropology)
B.A., 1891, M.A., 1896, Roanoke College; B.D., 1895, Vanderbilt University.
Thesis: Did the Semites Pass through a Totem Stage? (Not published.)
- Nevil Monroe Hopkins, (Chemistry)
B.S., 1899, M.S., 1900, Columbia University.
Thesis: Some Experiments on Electrolytic Conductivity with Reference to the Ionic Theory. (G. W. U. Bull., 3 [3], 91-94, 1904.) (Published separately as "Experimental Electrochemistry," by D. Van Nostrand Company, New York, 1905, 284 pp., 231 ill.)

1903.

- Edwin Allston Hill, (Chemistry)
A.B., 1875, A.M., 1902, Yale University; M.S., 1901, Columbia University.
Thesis: The Constitution of Certain Halogen Oxyacids as inferred from Thermochemical Data. (G. W. U. Bull., 3 [4], 94-103, 1904.)
- William Mather Lamson, (Architecture)
B.S., 1897, C.E., 1899, Columbia University.
Thesis: Iron and Steel Domes. (Not published.)
- Thomas Malcolm Price, (Biochemistry)
B.S., Maryland Agricultural College; M.S., 1900, Columbia University.
Thesis: The Influence of Varying Strength Solutions of Formaldehyde on some of the Enzymes of Animal Origin. (G. W. U. Bull., 3 [4], 104-108, 1904.)
- Harriet Richardson, (Zoölogy)
A.B., 1896, A.M., 1901, Vassar College.
Thesis: Contributions to the Natural History of the Isopoda. (Proc. U. S. Nat. Museum, 27, 1-89, 1904, and Bull. U. S. Fish Com., pp. 47-54, September 17, 1903.)

1904.

- William Macon Coleman, (History)
A.B., 1858, A.M., 1892, University of North Carolina.
Thesis: A Refutation of Mommsen's Theory on Cæsar's Agrarian Policy. (Not published.)
- Frank Van Vleck, (Mechanical Engineering)
M.E., 1884, Stevens' Institute of Technology.
Thesis: Improvements in Ship Construction. (Not published.)
- Andrew Wilson, (American History)
B.S., 1885, B.O., 1886, B.A., 1886, M.A., 1890, Kansas Normal College; L.L.B., 1890, L.L.M., 1891, Georgetown University; M.L., 1892, D.C.L., 1893, Yale University.
Thesis: Influence of John Marshall on the Political History of the United States. (Not published.)

1905.

- Ray Smith Bassler, (Palæontology)
B.A., 1902, University of Cincinnati; M.S., 1903, The Columbian University.
Thesis: A Study of the James Types of Ordovician and Silurian Bryozoa. (Proc. U. S. Nat. Museum, xxx, 1906, 1-66, pls. I-IV.)

Hiram Colver McNeil, (Chemistry)

B.S., 1896, M.S., 1899, Denison University.

Thesis: On the Constitution of Certain Natural Silicates. (G. W. U. Bull., 4 [3], 76-79, 1905.) (Journal American Chemical Society [28], 590-602, 1906.)

Henry Albert Pressey, (Hydraulic Engineering)

B.S., 1893, The Columbian University; B.S., 1896, Massachusetts Institute of Technology.

Thesis: Flow of Water in Channels. (Not published.)

Warren Waverley Phelan, (Comparative Jurisprudence)

B.A., 1894, M.A., 1896, Columbia University.

Thesis: An Historical Sketch of the Criminal Law of Louisiana from the Founding of the Colony to the Establishment of the State. (Not published.)

1906.

Cornelius Lott Shear, (Botany)

B.S., 1896, M.S., 1900, University of Nebraska.

Thesis: Cranberry Diseases. (G. W. U. Bull., 5 [4], 75-78, 1906. Bulletin 110, Bureau of Plant Industry, U. S. Department of Agriculture, 1907.)

Martin Norris Straughn, (Agricultural Chemistry)

B.S., 1899, Maryland Agricultural College; M.S., 1902, Columbia University.

Thesis: The Chemistry of Different Varieties and Individual Ears of Sweet Corn as Affected by Enzymes, Climatic Conditions, and Breeding. (Bulletin 120, Maryland Agricultural Experiment Station, 1907.)

1907.

Rev. George Brodthage, (Germanics)

Universities of Strasburg, Berlin and Göttingen.

Thesis: Germanentum, Gottmenschentum. (G. W. U. Bull., 6 [3], 82-86, 1907.)

Frederick Warren Grover, (Physics)

B.S., 1899, Massachusetts Institute of Technology; M.S., 1901, Wesleyan University, Connecticut.

Thesis: Simultaneous Measurement of the Capacity and Power Factor of Condensers. (G. W. U. Bull., 6 [3], 92-95, 1907. Bulletin of the Bureau of Standards, May 23, 1907, Reprint No. 64, pp. 371-431.)

Edward Elliott Richardson, (Philosophy)

B.S., 1904, M.D., 1895, M.S., 1905, George Washington University.

Thesis: Mechanism and Teleology. (G. W. U. Bull., 6 [3], 87-91, 1907.)

Rabbi Abram Simon, (Philosophy)

1894, Cincinnati Hebrew Union College; B.L., 1894, University of Cincinnati.

Thesis: The Constructive Character and Function of Religion in Human Progress as Illustrated by the Religion of Israel. (Not published.)

Walter Otheman Snelling, (Chemistry)

B.S. in Chemistry, 1904, Columbia University; B.S. in General Science, 1905, Harvard University; M.S., 1906, Yale University.

Thesis: Contributions to the Knowledge of Tellurium. (Not published.)

Warner W. Stockberger, (Botany)
 B.S., 1902, Denison University.
 Thesis: The Effect of Certain Toxic Solutions on Nuclear and Cell Division
 in Root Tips of *Vicia Faba*. (Not published?)

Frank Cummings Cook, (Chemistry)
 B.A., 1900, M.A., 1902, M.S., 1904, Yale University.
 Thesis: Phosphorus Metabolism Experiments. (Not published.)

1908.

Clara Southmayd Ludlow, (Preventive Medicine)
 B.S., 1900, M.S., 1901, A. and M. College, Mississippi.
 Thesis: The Mosquitoes of the Philippine Islands. The distribution of cer-
 tain species and their occurrence in relation to the incidence of certain
 diseases. (Published separately, Washington, D. C., 1908, 65, pp.)

Benjamin George Wilkinson, (History)
 B.A., 1897, University of Michigan; M.A., 1905, Union College.
 Thesis: The Overthrow of the Concordat by the Third Republic. (Not pub-
 lished.)

1909.

William Clifton Phalen, (Geology)
 S.B., 1899, S.M., 1902, Massachusetts Institute of Technology.
 Thesis: Economic Geology of the Kenova Quadrangle in Kentucky, Ohio,
 and West Virginia. (Bulletin 349, U. S. Geological Survey.)

Harry Wilson Houghton, (Biochemistry)
 B.S. in Chemistry, 1906, M.S., 1907, The George Washington University.
 Thesis: The Effect of Cold Storage on Chicken Meat. (Not published.)

George Whitfield Stiles, Jr., (Preventive Medicine)
 B.S., 1900, Oklahoma Agricultural and Mechanical College; M.D., 1905,
 The George Washington University.
 Thesis: The Possibility of Shellfish Contamination from Sewage-Polluted
 Waters. (Not published.)

Luther Hess Waring, (Germanics)
 B.A., 1905, The George Washington University; M.A., 1904, Columbian
 University.
 Thesis: Martin Luther's Political Reforms of Germany. (Not published.)

1910.

August Frederick Wilhelm Edler.
 B.A., 1906, M.A., 1907, M.Dip., 1908, The George Washington University.
 Thesis: The Relation of the Dutch Republic to the American Revolution.

James Henry Gardner, (Geology)
 B.S., 1900, M.S., 1906, Kentucky State College.
 Thesis: The Naciminto and Torrejon Formations of the Puerco Group.

Herbert Harvey Kimball, (Astro-Physics)
 B.S., 1884, New Hampshire College of Agriculture and Mechanic Arts;
 M.S., 1900, Columbian University.
 Thesis: Solar Radiation, Atmospheric Absorption and Sky Polarization.

William Thomas Sheperd, (Psychology)
 B.Sc., 1899, Gale College; M.A., 1905, M.S., 1906, Oklahoma State Uni-
 versity.
 Thesis: On some Mental Processes of the Rhesus Monkey.

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 EPFLEY, J. K. [Trustee, P., 182] 1417 Belmont St
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 (271)

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 YOUNG, H. C. [D., 167] 728 13th St

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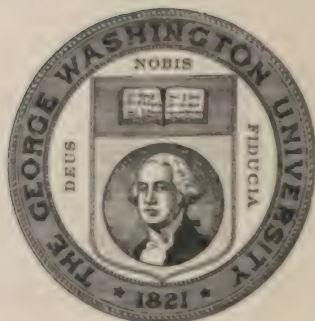
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VOLUME IX

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DECEMBER, 1910



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WASHINGTON, D. C.
PRESS OF JUDD & DETWEILER, INC.
1910

THE PRESIDENT.

At a meeting held on November 30, 1910, the Board of Trustees unanimously elected Rear Admiral Charles Herbert Stockton, U. S. N. (retired), President of the University. After the resignation of President Needham, Admiral Stockton, then a member of the Board of Trustees, was on May 26, 1910, named Acting President to serve from August 31, 1910. His appointment to the Presidency is, therefore, a confirmation of an earlier action tested and thoroughly approved by its fruits, and an assurance of stability.

President Stockton was born on October 13, 1845, at Philadelphia, Pa. From 1865, when he graduated at the Naval Academy, until October 15, 1907, when he was retired from the Navy, he served the Government, always effectively, in many and varied capacities. In sea service he has had the command at different times of the U. S. S. "Thetis," of the cruiser "Yorktown," of the battleship "Kentucky," and, in 1907, of the Special Service Squadron visiting Bordeaux, France, for the maritime exposition and afterward various French ports. While in command of the "Yorktown" and the "Kentucky" he was attached to the Asiatic station. He has made many cruises, one of the most interesting being in 1889, when as Lieutenant Commander of the "Thetis" he cruised in the Arctic Ocean from the mouth of the Mackenzie to Wrangel Land. On shore service he has been stationed at different times in the navy yards of Philadelphia, Washington, and New York, in the Hydrographic Office, and in the Bureau of Yards and Docks. In 1903-'05 he was naval attaché to the American Embassy in London, in 1906 president of the Board of Inspection and Survey, and in 1906-'07 president of the Naval Examining and Retiring Board. In the years 1891-'94 he was second in command at the Naval War College under Admiral Mahan, then president, and a lecturer on various subjects, including International Law. In the years 1898-1900 he was president of the College.

In 1908 he was appointed, while traveling abroad, the first delegate from the United States to the International Naval Conference held in London in 1908-1909, and was one of the signers of the Declaration of London. As a recognition of his services he was given the degree of LL. D. by The George Washington University.

President Stockton, amid the interests of a busy life of wide and varied experience, has found time to publish the "History of the U. S. Naval Asylum," "The Laws and Usages of War; a Naval War Code," and has edited a "Manual of International Law." His active public spirit manifestly untinged with selfishness has led him to write and speak much which never has been published.

THE STATUS OF THE UNIVERSITY.

The University is fortunate, in starting on a new régime, to have at its head a man whose experience, ability, and recognized integrity of character gives assurance of a conservative and at the same time a progressive policy. It starts the year in changed but well-adapted quarters, with a devoted body of teachers who are the more firmly united in a common cause because of the difficult times they have passed through in common, and with a registration of students which, considering the upheaval of last year, proves beyond doubt the existence of an active demand for what the University can give. The registration on November 28, 1910, stood as follows:

Graduate Studies	37
Arts and Sciences	243
Engineering	172
Teachers	85
Political Sciences	60
Law	324
Medicine	95
Dentistry	41
Pharmacy	77
Veterinary	64

1,207

The financial condition of the University is much improved. The sale of the University buildings on the corner of 15th and H streets has enabled it to pay off all its mortgage debt, and all of its other debts except about \$15,000. There is a contingent liability to the persons who have given money to the University on subscriptions which have been cancelled; but it is believed that few or none of the persons will ever ask for repayment, and the amount of \$15,000 may therefore be considered the correct indebtedness of the institution. Repayment to the endowment funds of money drawn from those funds for general expenses has been assured by a deed of trust for \$350,000 on the Medical School and Hospital property made to The National Savings and Trust Company in favor of the Washington Loan and Trust Company, fiscal agent of the University in its capacity of Trustee of endowment funds. In taking this action the University has done what an individual trustee would do if he pledged his personal property for the performance of his duties as trustee. It has pledged the Medical School and Hospital property, which it owns without restrictions, and which may therefore be considered personal property, for the repayment of the money it has held under restrictions and therefore as a trustee. To distinguish between its dual capacities and at the same time to emphasize them, it has named a fiscal agent to receive the money for it in its capacity of trustee. By this action the endowment funds are reestablished.

FALL CONVOCATION.

At a meeting of the Executive Committee held on September 29, 1910, it was resolved that the Fall Convocation be omitted for the year. The degrees which otherwise would have been conferred at the Convocation were instead conferred at a private function held in the President's office on the afternoon of October 19, 1910. The candidates were formally recommended to the President for the degrees by their respective Deans, and were then formally presented by the President with their diplomas. The degrees conferred were as follows:

Bachelor of Arts

CLARENCE GILBERT FARWELL

Bachelor of Laws

WILLIAM ERNEST FAULKNER

A. B., 1907, Union College.

Master of Patent Law

CHESTER HARMON BRASELTON

B. S., 1904, Valparaiso University.

CARL A. HELLMAN

B. S., 1906, M. S., 1909, University of Illinois.

NATHAN COHEN

E. E., 1906, University of Minnesota.

Doctor of Medicine

LEWIS WILLIAM FETZER

KATHERINE M. HERRING

NESMITH P. NELSON

BY-LAWS OF THE GEORGE WASHINGTON UNIVERSITY.

Adopted by the Board of Trustees on November 30, 1910.

ARTICLE I.

The President of the University.

SECTION 1. The President of the University shall hold office without limit of time, until his resignation be accepted, or he be removed from office by the Board of Trustees; he shall be the executive head of the University and of all its departments, exercising such supervision, direction, and control as will promote the efficiency of every department; he shall be responsible, under the supervision of the Board of Trustees, for the discipline of the University; he shall preside at the meeting of the Faculties, and be the official medium of communication between the Faculties and the Board of Trustees, and between the students of the University and the Board of Trustees; he shall recommend to the Board of Trustees appointments to the several Faculties; he shall be responsible for carrying out such measures concerning the internal administration of the University as the Board of Trustees may enact. He shall make a yearly report to the Board of Trustees at the January meeting concerning the state of the University. He shall control the expenditure and administration of the yearly budget when formally adopted by the Board of Trustees.

ARTICLE II.

Board of Trustees.

SECTION 1. No member of the teaching staff of the University except the President of the University, or of the teaching staff of any college incorporated under the charter of the University, while he remains such, shall be capable of holding the office of Trustee of the University.

SEC. 2. At the annual meeting of the Board after the election of Trustees, the Board shall elect by ballot from among their number a Chairman and Vice-Chairman of the Board to serve until the next annual meeting and until their successors are elected and qualified. The Chairman of the Board, and in his absence the Vice-Chairman, shall preside at all meetings of the Board of Trustees.

SEC. 3. At the annual meeting after the election of trustees the Board shall elect by ballot the following officers, to serve until the next annual

meeting and until their successors are elected and qualified: a Secretary, a Treasurer, an Auditor, and a Counsel of the University.

SEC. 4. In the event of a failure for any reason so to elect either or all of the said officers, or in case of any vacancy from any cause, then an election may be held for the unexpired term at a meeting called for that purpose.

SEC. 5. The annual meeting of the Board of Trustees shall take place on the Wednesday nearest the first day of June of each year.

SEC. 6. Stated meetings of the Board shall be held on the second Wednesdays of October and January.

SEC. 7. Notice of all stated meetings shall be mailed by the Secretary of the University to each member of the Board at least five days previous to the time of such meetings.

SEC. 8. Special meetings may be called at any time by the President of the University, the Executive Committee, or by seven members of the Board of Trustees. The Secretary shall issue the notices of such meetings.

SEC. 9. The call for special meetings shall state the nature of the business to be considered, and shall be mailed at least two days before the meeting is to be held.

SEC. 10. Seven members of the Board of Trustees shall constitute a quorum for the transaction of any business.

ARTICLE III.

Executive Committee.

SECTION 1. There shall be an executive committee of seven members of the Board of Trustees, of which the President of the University shall be a member *ex officio*. The other members of the Committee shall be elected by ballot at the annual meeting, and shall serve until their successors are elected. The Board shall designate one of the members of the Committee to act as Chairman.

SEC. 2. In case of inability to act on the part of any member of the Committee his place may be filled by the Board of Trustees.

SEC. 3. Four members of the Committee shall constitute a quorum for the transaction of business.

SEC. 4. The Committee is authorized to transact such business as may require attention between the regular meetings of the Board of Trustees; but the Chairman of the Committee shall make a report at each stated meeting of the Board on the proceedings of the Committee during the intervening period, and at any meeting of the Board, if any member of the Board shall request that the report of the proceedings of any meeting or meetings of the Committee be read, the same shall be read by the Secretary.

SEC. 5. Regular meetings of the Committee shall be held during the academic year monthly, on the second Tuesday of the month, and special meetings may be called by the Secretary whenever requested by the Chairman or any two members of the Committee.

SEC. 6. In case of inability to act on the part of the Chairman of the Committee, the Committee may appoint a temporary chairman for the meeting.

ARTICLE IV.

Chairman of the Executive Committee.

SECTION 1. It shall be the duty of the Chairman of the Executive Committee to have the superintendence of the business affairs of the corporation and to keep the Executive Committee and the Board of Trustees informed concerning the same, and to see that all matters of business relating to the corporation are regularly presented to the Executive Committee and the Board for action.

ARTICLE V.

Standing Committees.

SECTION 1. At the annual meeting there shall be appointed a Committee of three members for each school or department of the University, who shall visit and inspect the conditions and conduct of the school or department and make a written report thereon to the stated meetings of the Board of Trustees. Provisional appointments to any Faculty may be made by the President after consideration of the nomination of the Dean of the Faculty, and, with the approval of the committee of the school immediately concerned, the appointment to hold good until the next meeting of the Board.

ARTICLE VI.

The Secretary of the University.

SECTION 1. The Secretary of the University shall as such attend and keep minutes of all meetings of the Board of Trustees, the Executive Committee, the educational councils and faculties, as may by resolution of the Board be required to keep records. He shall give to any meeting at which he is entitled to be present any information concerning University affairs which he may have and which may be proper to be brought before such meeting. He shall have the custody of all the files and records of the University proper to his office; he shall have the custody of the corporate seal of the University, and shall affix it to corporate acts authorized by the Board of Trustees or the Executive

Committee, and he shall generally do and perform such administrative duties as may be assigned him by the President from time to time not inconsistent with the by-laws.

ARTICLE VII.

The Treasurer of the University.

SECTION 1. The Treasurer shall give a bond or shall be bonded in a surety company, at the expense of the University, for the faithful performance of his duties in such sum and with such sureties as shall be approved by the Board of Trustees.

SEC. 2. He shall keep all the funds of the University in such bank or banks as the Board of Trustees shall designate; he shall keep the trust funds, and the full account thereof, separate from the current or general funds and accounts of the University; he shall make monthly statements, showing the current financial operations and the condition of the trust funds and other invested funds to the Executive Committee; he shall make a full report annually to the Board of Trustees as specified in Article XI, and he shall at such other times make such reports as the Trustees may require.

SEC. 3. He shall make payments only by checks upon the bank countersigned by the President of the University, or in his absence by the Secretary, and only for investments, salaries, bills, and expenses authorized by the Board of Trustees or the Executive Committee, provided, however, that when the Treasurer is absent or incapacitated, or when the office of Treasurer is vacant, or when the President and Secretary are both absent or incapacitated, or in any other emergency, the Executive Committee may by resolution make special and temporary arrangements for the signing or countersigning of checks.

ARTICLE VIII.

The Auditor of the University.

SECTION 1. The Auditor of the University shall make three audits each year of the books and accounts of the Treasurer. The fiscal year shall end at midnight on June 30th of each year, and the accounts shall be audited as of December 31st, March 31st, and June 30th at midnight. The respective audits shall be completed before February 1st, May 1st, and August 1st in each year.

SEC. 2. A corporation may be elected by the Board of Trustees as the Auditor of the University.

ARTICLE IX.

The Counsel of the University.

SECTION 1. The Counsel of the University shall render opinions to the President, the Board of Trustees, or to the Executive Committee, when requested, upon legal questions arising in the management of the educational or business affairs of the University, and shall represent the University in all legal proceedings prosecuted by or against the University. The Counsel of the University may be a member of the Board of Trustees.

ARTICLE X.

Committee on Catalogue.

SECTION 1. In June of each year the annual catalogue of the University shall be prepared by a committee consisting of the President of the University as Chairman, the Secretary of the University, and three members of the Faculty of the University appointed by the President. The catalogue shall be published annually in pamphlet form. Each annual catalogue shall contain the charter and by-laws of the University.

ARTICLE XI.

Annual Financial Report.

SECTION 1. Between July 1st and October 1st in each year there shall be prepared by the Treasurer a financial report showing in detail the financial condition of the University during the previous year, which financial report shall be certified by the Auditor to be correct. This report shall be filed with the Secretary on or before October 1st, and shall be laid before the Board of Trustees at their October meeting, and when approved by the Board of Trustees shall, with any modifications ordered by them and assented to by the Treasurer and Auditor, be printed by the University in pamphlet form.

ARTICLE XII.

Sale of Land and Other Assets.

SECTION 1. Real estate and other securities of the University shall not be sold or disposed of except by direction of the Board of Trustees.

SEC. 2. All deeds and conveyances of real estate belonging to the University shall be signed by the President of the University and the Secretary, and the same shall be acknowledged, attested, and the seal of the University attached thereto by the Secretary.

BY-LAWS OF THE GEORGE WASHINGTON UNIVERSITY. II

ARTICLE XIII.

Amendments.

SECTION I. These by-laws may be amended or repealed at any meeting of the Board by a vote of two-thirds of all the members of the Board.

ARTICLE XIV.

Former By-Laws Repealed.

SECTION I. All by-laws heretofore enacted are hereby repealed,
Approved.

ORDINANCE.

Adopted by the Board of Trustees on December 22, 1910.

ARTICLE I.—*Organization.*

SECTION 1. The educational work of the University shall be divided into departments, and again subdivided into colleges or schools. The departments, colleges, and schools forming an integral part of the University are as follows: The Department of Arts and Sciences, comprehending the School of Graduate Studies, the College of Arts and Sciences, the College of Engineering and Mechanic Arts, the College of the Political Sciences, the Teachers College; the Department of Law; the Department of Medicine; the Department of Dentistry. These departments, colleges, and schools are subject to the Board of Trustees represented by the President of the University, and unless otherwise noted, to the rules and regulations herein set forth.

SEC. 2. Associated colleges organized in accordance with the charter of the University on independent financial foundations are under the immediate control of their respective Boards of Trustees, subject in educational matters to the authority of the President and the University Board of Trustees. The National College of Pharmacy and the College of Veterinary Medicine are such associated colleges.

SEC. 3. The Department of Medicine, including the College of Medicine and the University Hospital, and the Department of Dentistry are organized under special ordinances of the Board of Trustees, and are subject to the rules and regulations of this ordinance only where the special ordinances governing them do not conflict with this ordinance.

ARTICLE II.—*Faculties.*

SECTION 1. The College of Arts and Sciences, the College of Engineering and Mechanic Arts, the College of the Political Sciences, and the Teachers College shall together be under the immediate charge of one faculty—the Faculty of Undergraduate Studies. The College of Medicine and the Department of Dentistry shall together be under the immediate charge of one faculty—the Faculty of Medicine. The School of Graduate Studies and the Department of Law shall each be under the immediate charge of a faculty. The faculties shall recommend to the Board of Trustees candidates for degrees, diplomas, certificates, and awards.

SEC. 2. Each faculty shall be composed of all the Professors, Assistant Professors, and Instructors who teach in the Department, School, or College under the charge of that faculty, and of such other members as the faculty may, on the recommendation of the Dean, with the approval of the President, admit to membership. The President shall be *ex officio* a member of each faculty, and the Secretary shall *ex officio* have voice at all faculty meetings, but no vote.

SEC. 3. A faculty may, at its discretion, delegate any of its purely administrative powers to an executive committee of which a Dean shall be Chairman, the members of which shall be nominated by that Dean and appointed by the President. Every executive committee shall be subject to the authority of the faculty from which it is appointed, except that the executive committee of the College of the Political Sciences shall have the powers of an independent faculty in all matters pertaining solely to the degree of Master of Diplomacy.

ARTICLE III.—*President's Council.*

SECTION 1. The President's Council shall be a legislative body for all administrative educational questions, the final confirmation resting upon the President or the Board of Trustees.

SEC. 2. The President's Council shall be composed of the Deans *ex officio* and a representative from each department, college, and school of the University, to be appointed by the Board of Trustees on the recommendation of the President.

ARTICLE IV.—*Deans.*

SECTION 1. The Dean of each department, college, or school shall be appointed by the Board of Trustees from among the members of its faculty. The Dean shall, under the President, be the chief executive officer of his department, college, or school. As such he shall have authority in his department, college, or school to enforce such regulations as may be imposed by the Board of Trustees or the Faculty. He shall be held responsible for the proper preparation and conduct of the business of his department, college, or school, and for the performance of such administrative duties as pertain to his office and may be required of him by the President. He shall make annual written reports to the President.

ARTICLE V.—*Titles of the Teaching Staff.*

SECTION 1. The academic titles of those engaged in teaching shall be Professor, Assistant Professor, Instructor, Assistant, Demonstrator, and Lecturer. The word "Associate" may be prefixed to any title

where, under the terms of this ordinance, it is appropriate, and in the Department of Medicine this title may be used as provided in the special ordinances governing that department.

ARTICLE VI.—*Appointments.*

SECTION 1. Instructors, Assistants, Demonstrators, and Lecturers shall, in the absence of agreement to the contrary, be appointed annually, with such compensation as shall be fixed by the Board of Trustees at the time of the appointment.

SEC. 2. Assistant Professors shall not be appointed for more than three years, subject to removal in accordance with the provisions of the charter of the University, and shall serve as Assistant Professors for at least three years before being eligible for promotion to a professorship.

SEC. 3. Professors shall be appointed without limit of time, subject to removal in accordance with the provisions of the charter of the University.

ARTICLE VII.—*Academic Year.*

SECTION 1. The academic year shall begin on the last Wednesday of September, and shall end on the Wednesday following the annual meeting of the Board of Trustees.

The George Washington University

COLLEGE OF VETERINARY MEDICINE

1910-1911



Washington, D. C.
Published by the University
June, 1910

The George Washington University
COLLEGE OF VETERINARY
MEDICINE



2113-2115 FOURTEENTH STREET N. W.
WASHINGTON, D. C.

The George Washington University

COLLEGE OF VETERINARY MEDICINE

2113-2115 FOURTEENTH ST. N. W.
WASHINGTON, D. C.

CATALOGUE
1910-1911

PUBLISHED BY THE UNIVERSITY, AT WASHINGTON, D. C., IN JUNE, 1910

GEORGE WASHINGTON'S DESIRE FOR A GREAT UNIVERSITY AT THE
CAPITAL OF THE NATION

"It has been my ardent wish to see a plan devised, on a liberal scale, which would have a tendency to spread systematic ideas through all parts of this rising empire, thereby to do away with local attachments and state prejudices, as far as the nature of things would, or indeed ought, to admit, from our national councils. Looking anxiously forward to the accomplishment of so desirable an object as this is (in my estimation), my mind has not been able to contemplate any plan more likely to effect the measure than the establishment of a university. . . ."

George Washington, in His Last Will.

"The Federal City, from its centrality and the advantages which in other respects it must have over any other place in the United States, ought to be preferred as a proper site for such a university."

George Washington's Letter to Commissioners.

"And so on this birthday of the Father of His Country, I leave with you this thought: George Washington the testator, the people of the United States the executor, the bequest a university, its domicile this District, its field of toil the Republic, the reach of its ever-increasing influence and glory the boundaries of space and time."

*Mr. Justice Brewer's Address at the George Washington
University Convocation, February 22, 1905.*

"Therefore, the objects of this movement are, to establish The George Washington University upon a commanding site given by the people of the District, with ample endowment furnished by the private benefactions of the people of the whole country, and thus to create the great University Washington and his associates desired to see established in the National Capital."

*Extract from Statement adopted by the
Citizens' Committee, March 11, 1907.*

The George Washington University

CALENDAR

College of Veterinary Medicine

1910

September 15, *Thursday*—Session begins with Opening Address, College of Veterinary Medicine.

October 19, *Wednesday*—Fall Convocation.

November 24-26, *Thursday to Saturday*, both inclusive—Thanksgiving recess.

RECESS FROM DECEMBER 23, 1910, TO JANUARY 2, 1911, BOTH INCLUSIVE.

1911

February 1, *Monday*—Second Term begins.

February 22, *Monday*—Winter Convocation.

February 22, *Monday*—Annual Meeting of the Alumni Association.

April 9-12, both inclusive—Easter holidays.

June 1, 2, 3, 4, *Tuesday to Friday*—Examinations for admission.

June 7, *Wednesday*—University Commencement.

SUMMER RECESS

September 8, 9, 10—Examinations for admission.

September 15—Opening Address, College of Veterinary Medicine.

CHRONOLOGICAL TABLE

- 1799. George Washington's last will and testament, urging the establishment of a university in Washington.
- 1821. Charter granted by Act of Congress creating "The Columbian College in the District of Columbia."
- 1825. The Medical School organized.
- 1865. The Law School organized.
- 1866. Mr. W. W. Corcoran gave the Medical School a building, 1325 H Street.
- 1872. Mr. Corcoran gave an endowment "to make the College an University."
- 1873. Act of Congress changing the name of the Columbian University.
- 1884. University building, Fifteenth and H Streets, occupied by various departments of the University.

- 1884. The Corcoran Scientific School organized.
- 1887. The Dental School organized.
- 1893. The School of Graduate Studies organized.
- 1898. The Department of Jurisprudence and Diplomacy organized.
- 1898. Incorporation of the George Washington Memorial Association.
- 1902. Merging of the College, the Corcoran Scientific School, and the School of Graduate Studies into one Department of Arts and Sciences.
- 1903. Conferences between representatives of the Washington Memorial Institution, the George Washington Memorial Association, and the Columbian University with a view to coöperation in graduate work.
- 1904. January 23. Act of Congress making the University non-sectarian and giving the Board of Trustees power to change the name.
- 1904. Suggestion of the George Washington Memorial Association that Columbian University change its name to The George Washington University, and its offer to erect a memorial building on the new site, at a cost of \$500,000, for graduate study and scientific research, accepted by the Board of Trustees.
- 1904. September 1. Change of name to The George Washington University.
- 1905. February 22. First Winter Convocation of The George Washington University.
- 1905. Act of Congress authorizing the incorporation of colleges under the University charter.
- 1905. Organization under the University charter of the Columbian College, the Washington College of Engineering, and the National College of Pharmacy.
- 1907. Organization of the College of Political Sciences.
- 1907. Organization of the Division of Education.
- 1908. Organization of College of Veterinary Medicine.

BOARD OF TRUSTEES

*CHARLES WILLIS NEEDHAM. LL.D.

President of the University and *ex-officio* Member of the Board

1910

SAMUEL H. GREENE, D.D., LL.D. EDWARD M. GALLAUDET, LL.D.
 SAMUEL W. WOODWARD WILLIAM F. MATTINGLY, LL.D.

JOHN JOY EDSON

REAR ADMIRAL CHARLES HERBERT STOCKTON

Acting President September 1, 1910

*Resigned August 31, 1910.

THOMAS H. ANDERSON	W. D. HOOVER
JOHN B. LARNER, LL.D.	HENNEN JENNINGS, C.E.
HENRY B. F. MACFARLAND	

THEODORE W. NOYES, LL.M.	ADMIRAL C. H. STOCKTON
HENRY C. PERKINS	LEWIS FLEMER, Ph.D.
ADMIRAL PRESLEY M. RIXEY	ABRAM LISNER
A. H. SNOW	

H. B. F. MACFARLAND, *Chairman* HARRY C. DAVIS, *Secretary*
E. M. GALLAUDET, *Vice-chairman* CHARLES W. HOLMES, *Treasurer*
WILLIAM A. DECAINDRY, *Auditor*

*CHARLES WILLIS NEEDHAM, LL.D.....PRESIDENT OF THE UNIVERSITY
HARRY C. DAVIS, L.H.D.....Secretary of the University

*CHARLES WILLIS NEEDHAM, LL.D.....PRESIDENT OF THE UNIVERSITY
CHARLES E. MUNROE, Ph.D.....Professor of Chemistry, and
Dean of the Faculty of Graduate Studies
HERMANN SCHOENFELD, Ph.D., LL.D.....Professor of German
CHARLES CLINTON SWISHER, Ph.D., LL.D.....Professor of History
WILLIAM ALLEN WILBUR, A.M.....Professor of English and
Dean of the College of Arts and Sciences
MITCHELL CARROLL, Ph.D.....Professor of Classical Languages
GEORGE NEELY HENNING, A.M.....Professor of Romance Languages
HOWARD LINCOLN HODGKINS, Ph.D.... Professor of Mathematics, and
Dean of the College of Engineering and Mechanical Arts
PHILANDER BETTS, E.E.... Assistant Professor of Electrical Engineering
EDWIN V. DUNSTAN, C.E.... Assistant Professor of Civil Engineering
HOWARD LEE MCBAIN, Ph.D. . Assistant Professor of Political Science,
and Dean of the College of the Political Sciences
HENRY PARKER WILLIS, Ph.D..... Professor of Finance

*Resigned August 31, 1910.

THE UNIVERSITY LIBRARY

The University Library comprehends (1) the Library of the Department of Arts and Sciences, (2) the Law Library, and (3) the Medical Library. It contains over 40,000 volumes.

The Library of the Department of Arts and Sciences includes the Germanic library of the late Professor Richard Heinzel of the University of Vienna, containing 7,200 books and pamphlets in Germanic philology and literature, and cognate branches; the Classical Library of the late Professor Curt Wachsmuth, of the University of Leipzig, containing 7,000 books and pamphlets in Greek and Roman literature, archaeology, and history; the Mount Vernon Alcove of the Political Sciences, containing 3,000 volumes in political history, international law, and the social sciences and the divisional collections in engineering and mechanic arts, architecture, and education. A well-equipped reference and reading-room is open for study and consultation from 9 a. m. to 6:30 p. m. It contains encyclopedias, dictionaries, standard works in general literature and in the various departments of study comprised under University subjects, also leading literary and scientific magazines and reviews. Students may draw books over night, and upon the special recommendation of the professor in charge of the subject concerned, for longer periods.

The Law Library contains 4,750 volumes and occupies a special room in the Law Building. It is open from 9 a. m. to 10 p. m.

The Medical Library, including the J. Ford Thompson collection of works on surgery, contains 2,650 volumes and is shelved in a room in the Medical School. It is open from 9 a. m. to 10:30 p. m.

Besides, the student has access to the Library of Congress, which, steadily perfecting its large collections of standard works in the various branches of University study, affords exceptional facilities for research. In addition, the Public Library of the District of Columbia is being rapidly equipped with books of special importance to the University student, and its facilities are available under the most favorable conditions. Under certain restrictions, the libraries of the governmental departments may also be utilized. All these libraries are within easy reach of the University.

**ANNUAL COMMENCEMENT AND FALL AND WINTER
CONVOCATIONS**

The Annual Commencement is held on the second Wednesday in June. The Fall Convocation is held on the third Wednesday in October. The Winter Convocation is held on the 22d of February. Degrees are publicly conferred on Commencement Day and at the Fall and Winter Convocations. Members of the faculties and candidates for degrees are expected to appear in academic caps and gowns.

**PRIVILEGES IN GOVERNMENTAL INSTITUTIONS OPEN TO
UNIVERSITY STUDENTS**

In order to promote research and the diffusion of knowledge, the Congress of the United States has made the scientific resources of the Government accessible to students under the terms of the following joint resolution, approved April 12, 1892:

"Resolved by the Senate and House of Representatives of the United States of America in Congress assembled, That the facilities for research and illustration in the following and any other government collections now existing or hereafter to be established in the city of Washington for the promotion of knowledge shall be accessible, under such rules and restrictions as the officers in charge of each collection may prescribe, subject to such authority as is now or may hereafter be permitted by law, to the scientific investigators and to students of any institution of higher education now incorporated or hereafter to be incorporated under the laws of Congress or of the District of Columbia, to wit:

1. Of the Library of Congress.
2. Of the National Museum.
3. Of the Patent Office.
4. Of the Bureau of Education.
5. Of the Bureau of Ethnology.
6. Of the Army Medical Museum.
7. Of the Department of Agriculture.
8. Of the Fish Commission.
9. Of the Botanic Gardens.
10. Of the Coast and Geodetic Survey.
11. Of the Geological Survey.
12. Of the Naval Observatory."

Libraries.—In the archives of the State and other Departments and in the statistical bureaus of these Departments are extensive accumulations of original historical documents and data which are invaluable to graduate students in history, political science, economics, sociology, and the allied topics of research. The Library of Congress, the Public Library of the District of Columbia, and the many highly specialized libraries attached to the various Departments of the Government are made easily accessible.

Museums.—In the collections of the National Museum, the Smithsonian Institution, the Army Medical Museum, the Museum of Naval Hygiene, and the departmental museums are found extensive series of specimens of great value to the student of anthropology, archaeology,

mineralogy, geology, paleontology, biology in all its branches, and other sciences. In the Patent Office are the records of the many inventions that has contributed so materially during our national existence to modify the conditions under which we live. The Army Medical Museum, which is open for inspection daily, presents a field for study superior to any other institution of the kind, either in this country or in Europe. Its library of medical books and periodicals is the best in the world. It has an unrivaled collection of anatomical and pathological specimens, illustrating normal anatomy and the results of disease in every form, and an almost unlimited number of other preparations showing the effect of gunshot wounds and surgical injuries of every kind. It also contains almost numberless crania of every human nationality. In the National Museum is found the most complete and best arranged collection of *Materia Medica* in the world. The drugs are shown in all their processes of manufacture, from the original package to the delicate alkaloid constituting the active principal.

Laboratories.—In the experimental sciences the most notable facilities are available, since in Washington are centered the Weather Bureau, with its appliances for the study of national problems in meteorology; the Coast and Geodetic Survey, from which the surveys of our territory are carried on and by which the figure of the earth and terrestrial magnetism are experimentally determined; the Hydrographic Bureau, which conducts the surveys of foreign coasts and the study of the oceans; the Bureau of Standards, which standardizes the instruments used in measuring mass, volume, heat, light, electricity, and all other magnitudes; the Geological Survey, which investigates the structure of the earth, ascertains our mineral resources, and supervises the sources of supply and means for distribution and control of water for irrigation purposes; the Department of Agriculture, which exists primarily for conducting original investigations for the benefit of agriculture in all its branches, and is therefore provided with extensively equipped laboratories for the study of chemistry, botany, vegetable physiology, entomology, biochemistry, bacteriology, comparative pathology, parasitology, the physics and chemistry of the soil, forestry, and microscopy; the Naval Observatory and Nautical Almanac Office, where resarches in astronomy and navigation are conducted; the Marine Hospital Service, which deals with national problems in hygiene; the Bureaus of Construction and of Steam Engineering of the Navy, having supervision over the designs and construction of our ships; the Bureau of Yards and Docks, having supervision over the engineering operations at our navy yards and naval stations; the Bureau of Equipment, which is charged with the electrical installations for the Navy; the United States Signal Corps, which has supervision over the electrical installations for the Army; the Engineer Corps of the Army, which is charged with river and harbor improvements, and the Light-house Board, which controls the system for lighting our navigable waters.

Of chemical laboratories for conducting the tests of materials, and especially for research work, there are now eighteen attached to the different departments at Washington. An extensive new laboratory is being equipped for the Marine Hospital and Public Health Service. This is the national health department of the Government. In this laboratory and in the laboratories of the Department of Agriculture there are superior facilities for all kinds of bacteriological and chemical investigations, and for the study of biochemistry, comparative pathology, and parasitology. The new laboratories and hospitals of the Army and the Navy also offer many opportunities for instruction.

Washington offers exceptional opportunities for special or advanced work in Mechanical Engineering. The departments of the Government charged with designing are all located here. In the Bureaus of Steam Engineering and of Construction and Repair, and Ordnance, of the Navy, are projected a large amount and extensive variety of heavy constructional work. Here is also located the United States Navy or Ordnance Gun Factory. The Ordnance Proving Station is but a few miles down the Potomac. Tours of inspection may be made to the large steel-works and shipbuilding plants in Baltimore, and the shipbuilding plant at Newport News.

REGISTRATION OF STUDENTS, MARCH 21, 1910

Graduate Studies.....	87
College of Arts and Sciences.....	302
College of Engineering and Mechanic Arts.....	180
College of Political Sciences.....	64
Teachers College.....	85
Division of Architecture.....	72
Department of Law.....	329
Department of Medicine.....	116
Department of Dentistry.....	27
College of Pharmacy.....	87
College of Veterinary Medicine.....	51
Total.....	1,400

ANNOUNCEMENT

The organization of a College of Veterinary Medicine under the charter of the George Washington University was authorized by the Board of Trustees on March 17, 1908.

The College of Veterinary Medicine aims to provide a thorough course in all branches relating to Veterinary Medicine. The course is intended to give the student a broad veterinary education, so that he can go forth as a general practitioner or specialize in one of the fields now occupied by veterinary experts.

In addition to the necessity for properly trained practitioners, there is a marked scarcity, especially in the Southern States, where there is a great and growing demand for the services of trained veterinarians in various lines of official work.

There is a demand for veterinary inspectors in the Bureau of Animal Industry, Department of Agriculture, which employs more veterinarians than any organization in the world, and which is constantly enlisting the services of trained young men for work either in the great abattoirs and stock-yards under government supervision, or in the quarantine service or as investigators in various lines of veterinary research. The salaries of these positions vary from \$1,400 to \$4,500 a year. The United States Army employs forty-two veterinarians in its cavalry and artillery service. These veterinarians are given the status of lieutenants (mounted), and their pay is from \$1,500 to \$2,500 a year.

Veterinarians, to enter either of these services, must be graduates of recognized veterinary schools, requiring a three years' graded course, and a competitive examination is required for both positions.

Almost every state of the Union employs state veterinarians and assistants at good salaries to investigate and suppress disease among domestic animals. A large number of trained veterinarians are given lucrative and attractive employment in the various state colleges and experiment stations as Professors of Veterinary Science.

The demand for veterinarians by the Health Department of the large cities is unprecedented. All of them are now awakening to the great necessity of a trained supervision over meat and milk supplies.

Large numbers of specially trained veterinarians will be needed in the near future to act as inspectors of meats and inspectors of dairy farms in all our large cities, for no other class of scientific men have been found which can successfully cope with this work as our modern, scientifically trained veterinarian.

With the amalgamation of interests and the cooperation now existing between the United States and the Central and South American Republics, which sentiment is now being strengthened by the Bureau

of American Republics in Washington, D. C., there will be a large and growing demand for scientific workers in these Republics, especially men trained for animal and plant industry.

Heretofore these Latin Republics have looked to Continental Europe for their veterinarians. At present the trend is toward this country, for several of our brightest veterinarians are now taking service with these republics, and with their recognition will come a demand for more veterinarians.

At no time in the history of veterinary service has there been a more opportune time for young men of ability to enter this profession and succeed. The vast amount of capital invested in our animals in the various states, and the widespread existence of tuberculosis and other diseases in them, and the relation which these bear to the health and wealth of the country, make it more and more necessary that there be a class of persons thoroughly educated for the duty of coping with these conditions.

The wonderful discoveries recently made in the cause and treatment of animal diseases, *i. e.*, hog cholera, so-called "milk fever" of cows, rabies, and tuberculosis have given to the modern veterinarian an equipment with which to fight disease most successfully and at the same time to save many millions of dollars annually for the stock growers of the United States. Never before has the practice of Veterinary Medicine occupied such a useful and dignified position.

WASHINGTON AS A SCIENTIFIC CENTER

The Capital City is particularly well located for students seeking any branch of education. It is midway between the states. Is clean, healthy, attractive, and offers exceptional opportunities for self-advancement. It is the favorite meeting place for scientific congresses of all kinds. In this city is located the headquarters of every large branch of the Government, and particularly its scientific research laboratories. A student has advantages here not afforded in any other city in this country.

Here is found the great Congressional Library, open day and night for reading and research work. It contains every book copyrighted in the United States, and most of those published abroad.

The Medical Library of the Surgeon General's Office, the largest medical library in the world, is open to students daily.

The Library of the Agricultural Department and Bureau of Animal Industry contains the largest, most up-to-date veterinary library in the United States, and is open every day to veterinary students.

The veterinary student will also find here the laboratory and experiment station of the Bureau of Animal Industry, where the highest class

of investigations of animal diseases is conducted, and which are model institutions, unequaled for their purpose in this country, and unsurpassed in the world.

Of great interest and value to every student are the National Museum, the Army Medical Museum, the Museum of Hygiene, U. S. N., the Botanical Gardens, the herbarium, green-houses, gardens and grounds, and the new and very instructive museum of the Department of Agriculture. In these the students have unrivaled advantages for the study of Anatomy, Materia Medica, Biology, Sanitary Appliances, Botany, etc. These are all free and are open to students every week day from 9 a. m. to 4 p. m.

The faculty is made up of well-known veterinarians and experienced lecturers, who are recognized as authorities on the subjects which they teach. The courses have been arranged to suit the requirements of modern veterinary education. The lectures on the control and eradication of contagious diseases and on meat inspection are a special feature, designed to fit the students for the many responsible and lucrative positions which have been opened up to competent men by recent state and national legislation.

The Administration Building and two hospital buildings of the College are located at 2113-2115 Fourteenth Street, N. W. In this building are the Dean's office, library, pharmacy, and faculty, reception, and operating rooms. The veterinary hospital and the canine hospital are equipped with all appliances for the cure and relief of sick and injured animals.

In addition to demonstrations in the hospitals, students receive clinical instruction in the private hospitals of Professors John P. Turner and John Lockwood. Clinics are held at abattoirs and stock-yards under governmental inspection and visits to stock and dairy farms in company with clinical professors are required.

COLLEGE OF VETERINARY MEDICINE

BOARD OF TRUSTEES

J. A. T. HULL	DAVID E. BUCKINGHAM, V.M.D.
H. ROZIER DULANY	JOHN LOCKWOOD, V.S.
WILLIAM CORCORAN EUSTIS	JOHN P. TURNER, V.M.D.

FACULTY

*CHARLES WILLIS NEEDHAM, LL.D.	President of the University
DAVID E. BUCKINGHAM, V.M.D.	Dean, Professor of Materia Medica, Therapeutics, and Canine Practice
CHARLES E. MUNROE, Ph.D.	Professor of Chemistry
SHEPHERD IVORY FRANZ, Ph.D.	Professor of Physiology
JOHN LOCKWOOD, D.V.S.	Professor of Veterinary Surgery
JOHN P. TURNER, V.M.D.	Professor of Theory and Practice of Veterinary Medicine
ROBERT J. FORMAD, V.M.D.	Professor of Comparative Histology and Pathology
ADOLPH EICHHORN, D.V.S.	Professor of Contagious Diseases and Sanitary Science
ALBERT H. HASSEL, M.R.C.V.S.	Professor of Veterinary Zoology and Parasitology
F. F. RUSSELL, M.D., Major U.S. Army,	Director Army Medical School, Professor of Bacteriology and Pathology
T. M. PRICE, M.S., Ph.D.	Professor of Physiological Chemistry
GEORGE H. HART, V.M.D.	Assistant Professor of Sanitary Science and National Quarantine
BENJAMIN T. WOODWARD, V.M.D.	Assistant Professor of Zootechnics, Milk Hygiene, and Dairy Inspection
ROSSLYN J. STAFFORD, D.V.M.	Assistant Professor of Veterinary Anatomy
HULBERT YOUNG, V.M.D.	Assistant Professor of Veterinary Obstetrics and Lecturer on Horseshoeing
WILLIAM W. BRIDE, A.B., LL.B.	Lecturer on Veterinary Jurisprudence
HERBERT S. WILLIAMS, V.M.D.	Lecturer on Military Veterinary Science
JACOB TRAUM, D.V.M.	Demonstrator of Histology and Embryology
TAYLOR O. TIMBERLAKE, Ph.G.	Demonstrator of Veterinary Materia Medica and Pharmacy
JOHN M. BUCK, D.V.M.	Demonstrator of Veterinary Anatomy
WILLIAM P. COLLINS, D.V.S.	Instructor in Clinical Veterinary Surgery
E. H. INGERSOLL	Assistant in Physiological Chemistry

*Resigned August 31, 1910.

REQUIREMENTS FOR ADMISSION

Students presenting a diploma from any recognized college, normal or high school, or a teacher's certificate, are eligible to admission without examination.

Students not having the above qualifications will be required to pass an examination in the common school branches, ordinarily required by the U. S. Civil Service Commission.

ADMISSION OF STUDENTS FROM OTHER SCHOOLS

Students of other recognized and approved veterinary schools may be admitted to this school as follows:

Those qualified to enter the second year of their own school may be admitted to the second-year class of this school; those qualified to enter the third year of their own school to the third year of this school. Provided, however, that the subjects pursued by the applicants in their previous year or years are reasonably equivalent to those required in the same year or years in this school, and that the requirements for advancement from class to class are the equivalent of those in this school. Applicants may be required to submit to examination in all the subjects pursued by the previous class of this school.

ADVANCED STANDING

Advanced standing will be given for degrees in Medicine, Dentistry, Veterinary Medicine, or Pharmacy.

Students holding degrees in Arts, Science, Philosophy, or Agriculture, who in the course of study for their degrees have pursued studies in chemistry, physiology, anatomy, histology, bacteriology, or pathology, equivalent to the courses in these subjects in this school, may upon satisfactory evidence of their proficiency be credited with such studies. Provided, however, that such students shall devote two years' study in veterinary medicine, the last year of which is passed in this college.

SPECIAL STUDENTS

Students, approved by the Dean, not candidates for the degree of Doctor of Veterinary Medicine, may be admitted without examination to pursue any course they may elect. Such courses cannot, however, be subsequently considered as time spent in the course for the degree of Doctor of Veterinary Medicine. Nor can such students enter upon the regular veterinary course without complying with all the regular requirements for admission.

CLASSIFICATION OF STUDENTS

Students are divided into three classes, according to their proficiency, and the time spent, viz., first year, second year, and third year. Students cannot advance to a higher class with more than one major

and one minor condition. Students failing in any subject or subjects may be permitted at the next examination period a re-examination in the subjects in which they fail. The Faculty may dismiss any student from the school, if in his judgment such student be deemed an unsuitable person, intellectually or otherwise for the profession of veterinary medicine.

ORDER OF INSTRUCTION

The subjects studied in each year are shown in the following table:

First Year	Second Year	Third Year
Anatomy	Bacteriology	Practice
Histology	Pathology	Surgery
General Chemistry	Physiology	Obstetrics
Materia Medica	Canine Med.	Therapeutics
Horseshoeing	Surgery	Meat Hygiene
Pharmacy	Practice	Veterinary Jurisprudence
	Clinics	Clinics
	Zootechnics	Parasitology
	Bio-Chemistry	Milk Hygiene

For lecture, laboratory and dissecting hours a schedule card is furnished.

Examinations are held at the end of each course. Clinical work in the veterinary and canine hospitals connected with the College and at abattoirs and stock and dairy farms, is required of second and third year students.

ANATOMY

ROSSLYN J. STAFFORD, D.V.M. *Professor of Veterinary Anatomy*
 JOHN M. BUCK, D.V.M. *Demonstrator of Anatomy*

The instruction in Anatomy is given in a series of lectures, demonstrations, recitations, and laboratory work, the latter being the most important.

The lectures are intended to present the general anatomical features of the horse, and other domestic animals; and to point out the anatomical relations of the organs and parts of the body most subject to surgical operations.

The horse is used as the type subject in dissection, and every student is required to dissect all the parts of the horse, and such other of the domesticated animals, including the ox, sheep, swine, dog, and cat, as may prove most expedient.

The laboratory is well supplied with all of the parts of the skeleton of the horse, and portions of the skeleton of various other domestic animals, for the work in osteology. Ample material is always available for the dissection of joints, muscles, viscera, and the vascular and nervous systems. The laboratory is also provided with a complete model of the horse, showing the relation of all the organs and parts of the body, for demonstrations in general and surgical anatomy. The course is completed in the first year.

TEXT-BOOK: Chauveau's Comparative Anatomy of the Domesticated Animals.

HISTOLOGY AND EMBRYOLOGY

ROBERT J. FORMAD, V.M.D., M.D. *Professor of Comparative
Histology and Embryology*
JACOB TRAUM, D.V.M. *Demonstrator of Histology and Embryology*

These subjects are taught by a series of carefully correlated lectures, recitations, quizzes, and demonstrations, occupying five hours each week during the first half of the year, and will include such instruction in microscopy as a working knowledge of the use of the simple and compound microscope and accessories, supplemented by the fundamental laws of optics; the method of preparing tissues for microscopic examination, and the technique of mounting.

Comparative histology will deal with the minute structure of the tissues and organs of various animals, including man. In addition to the microscopical demonstrations, lantern demonstrations will also be given.

Embryology under this head will present the salient features of the anatomy and physiology of the fecundated ovule up to the time of birth.

TEXT-BOOK: Histology, Böhm, Davidoff & Huber.

PHYSIOLOGY

SHEPHERD IVORY FRANZ, Ph.D. *Professor of Physiology*

The course in Physiology consists of lectures, demonstrations, and laboratory exercises. The lectures cover all the important facts and

theories regarding bodily functions of the animal, and are illustrated by diagrams, models, and prepared specimens.

In the laboratory each student performs a number of experiments on blood, on the circulation, on digestion, on the general functions of nerves and muscles, and on the special senses of animals.

Special emphasis is laid on the relation of normal physiological functions to the disturbances of function in disease and upon the physiological action of drugs.

It is intended in this way to bring the work of the Physiological Laboratory and other exercises into closer relation with the succeeding course in Pathology, Therapeutics, and General Veterinary Medicine.

TEXT-BOOK: Howell's Physiology, Smith's Veterinary Physiology.

CHEMISTRY

(First Year)

General Chemistry. A series of illustrated lectures, accompanied by recitations and exercises, on theoretical, inorganic, organic, and technical chemistry. The student is required to take notes on these lectures which he must submit for examination. *Tuesdays, Thursdays, and Saturdays*, at 4:50. Professor MUNROE and Mr. SWETT.

Laboratory Practice. A laboratory course for the study of the principles of chemistry which is designed to instruct students in the methods of conducting chemical experiments. *Tuesdays and Thursdays* at 1:30 or 7. Professor MUNROE and Assistant Professor HILL.

TEXT-BOOKS: Holland's Medical Chemistry and Toxicology.

PHYSIOLOGICAL CHEMISTRY

(Second Year)

T. M. PRICE, M.S., Ph.D.,.....*Professor of Physiological Chemistry*

E. H. INGERSOLL.....*Assistant*

This course will consist of lectures and laboratory instruction, and includes the study of water from a sanitary standpoint; the chemical examination of milk, the tissues and fluids of the body; the isolation of the digestive enzymes, and a study of their action in vitro.

MATERIA MEDICA AND THERAPEUTICS

DAVID E. BUCKINGHAM, V.M.D.,.....*Professor of Veterinary
Materia Medica and Therapeutics*

TAYLOR O. TIMBERLAKE, Ph.G.,...*Demonstrator of Veterinary Materia
Medica and Pharmacy*

First year. (1) Lectures upon and demonstrations of drugs and their preparations and doses used in veterinary practice will be followed

by recitations to assist in memorizing. (2) Practical exercises will be given in prescription writing, also a short course in Veterinary Pharmacology.

Third year. (1) Systematic lectures upon the physiological action of drugs and their effects in disease, their therapeutic uses, and their methods of administration to animals. (2) Prescription writing, in which students are given hypothetical cases for which to prescribe. (3) The therapeutic application of various agencies not drugs.

TEXT-BOOK: Winslow's Veterinary Materia Medica and Therapeutics.

PRACTICE OF VETERINARY MEDICINE

JOHN P. TURNER, V.M.D.....*Professor of Veterinary Medicine*

This subject is taught by a series of lectures, recitations, quizzes, and clinics extending over a period of two years.

The student is personally drilled in all the various diseases and doctrines taught in a well regulated veterinary school.

Especial attention is given to practical work whereby the student can become proficient in the diagnosis and treatment of disease.

Visits are required to the three veterinary hospitals in connection with the University, and personal attention is given students in visits to various large stables in and adjacent to the city of Washington, where practical instruction is given the second and third year classes in physical diagnosis among horses, cows, and hogs.

Equal attention is given diseases of cattle as of horses, whereby the student is properly fitted for either city or country practice.

Diseases of food-producing animals will be thoroughly explained.

TEXT-BOOKS: Friedberger and Froehner's Pathology and Therapeutics of Domestic Animals; Robertson's Practice of Equine Medicine; Williams' Principles and Practice of Veterinary Medicine; Fleming's Manual of Veterinary Sanitary Science and Police; Glass' translation of Müller's Diseases of the Dog.

VETERINARY SURGERY

JOHN LOCKWOOD, V.S.....*Professor of Veterinary Surgery*

WM. P. COLLINS, D.V.S.....*Instructor in Clinical
Veterinary Surgery*

The instruction given in this course embraces systematic lectures upon the principles and practice of Veterinary Surgery.

The different surgical operations are illustrated in clinic and upon the cadaver and the uses of all the important surgical instruments and appliances are demonstrated in the same manner. The use of anæ-

thetics, the practice of dental surgery and castration on all domestic animals will receive special attention.

TEXT-BOOKS: Moeller's Operative Veterinary Surgery; Fleming's Operative Veterinary Surgery; Hobday's Canine and Feline Surgery; Williams' Principles and Practice of Veterinary Surgery; Pfeiffer and Williams' Surgical Operations.

BACTERIOLOGY AND PATHOLOGY

T. C. RUSSELL, M.D.....*Professor of Bacteriology and Pathology*
(*Curator Army Medical Museum*)

Bacteriology. This subject comprises laboratory instruction in the fundamental principles and methods of pure bacteriology. Thorough drilling is given in the preparation of culture media, in disinfection, sterilization, staining, and the general methods of bacterial differentiation. Following this course, which is given daily during October, the further study of bacteria is taken up in connection with and as applied to pathology.

Pathology comprises the laboratory study of the general and special phenomena of inflammation, and a detailed study of the pathological processes found in the various diseases. The relation of bacterial and other microphytic life to disease processes and results is studied coincidentally and constitutes a course in applied bacteriology. In connection with the laboratory work a course of lectures and demonstrations is given upon immunity, serum therapy, and protective inoculation.

Surgical Pathology. A special course in the healing of wounds and injuries and in the pathology of surgical operations is given in the third year.

Clinical Microscopy, comprising the study of the various tissues, fluids, ejecta, and dejecta, with a view to diagnosis of diseased conditions, is given in the first part of the third year.

TEXT-BOOK: Abbott's Principles of Bacteriology, Delafield and Prudden's Pathology.

CONTAGIOUS DISEASES AND SANITARY SCIENCE

ADOLPH EICHHORN, D.V.S.....*Professor of Contagious Diseases*
and Sanitary Science

GEORGE H. HART, M.D., V.M.D.....*Assistant Professor of Sanitary*
Science and National Quarantine

The lectures in this course will be given with reference to the etiology, pathogenesis, symptoms, diagnosis, treatment, and prevention of the contagious diseases. Local and national regulations and measures

governing the control and eradication of diseases, with particular reference to the work of the United States Government in the eradication of contagious diseases, will be clearly explained.

TEXT-BOOKS: Moore's, The pathology of Infectious Diseases of Animals; Friedberger and Frochner's Pathology and Therapeutics of Domestic Animals.

ZOOTECHNICS AND MILK HYGIENE

B. T. WOODWARD, V.M.D. *Assistant Professor of Milk Hygiene
and Zootecnics*

The course covers the chief phases of live-stock work, including the judging, breeding, feeding, and management of horses, cattle, sheep and swine.

It is introduced by discussions upon the origin of animal life, natural selections, the origin of breeds, and the domestication of animals.

The principles of breeding, heredity, environment, selection, individual conformation, the history and development of breeds, principles of animal nutrition, balanced rations, practical feeding, and the economic production of beef, milk, mutton, and pork are given consideration.

Students obtain practical experience in the judging of the various breeds and classes of animals, by visits to neighboring farms.

The course in Milk Hygiene will be given by lectures and demonstrations throughout the third year. The students will be taught the theory of milk secretion, the composition and characteristics of milk, the various methods of testing, together with the chemistry and bacteriology of milk, abnormal forms of milk, and diseases transmissible through milk to bovines and humans, with a study of the epidemics produced. Sanitary stabling and the sanitary handling of milk will be considered, showing the construction of various types of dairy barns and dairy houses, the manner of milking, care of the milk, and the varieties and care of dairy utensils. Also a study of sterilization and pasteurization.

TEXT-BOOKS: Plumbs, Types and Breeds of Farm Animals; Pearson's translation Jensen's Essentials of Milk Hygiene.

VETERINARY ZOOLOGY AND PARASITOLOGY

ALBERT H. HASSELL, M.R.C.V.S. *Professor of Veterinary Zoology*

This course will embrace Zoology and the various parasites with which the various domestic animals are infested. Instruction as to prevention, eradication, and the treatment of the diseases caused by them will be given.

TEXT-BOOK: Neuman, Animal Parasites.

VETERINARY OBSTETRICS

HULBERT YOUNG, V.M.D....*Assistant Professor of Veterinary Obstetrics*

The course of instruction will consist of lectures on obstetrical anatomy, foetal development, presentations, and the diseases incidental to the periods of gestation and parturition.

The lectures will be illustrated by diagrams, models, natural preparations, and other appliances for demonstrating the principles taught.

TEXT-BOOK: Fleming, Dalrymple.

HORSESHOEING

HULBERT YOUNG, V.M.D.....*Lecturer on Horseshoeing*

The course is intended to familiarize students with the principles of shoeing, the examination of the feet and proper use of special shoes for relief of defects or disease.

TEXT-BOOK: Lungwitz on Horseshoeing, Adams' translation.

MILITARY PRACTICE

HERBERT S. WILLIAMS, V.M.D..*Lecturer on Veterinary Military Practice*
(U. S. Army, Fort Myer, Va.)

This course consists of lectures and demonstrations of purely military veterinary subjects, and is given at Fort Myer, Va., the cavalry and artillery post near Washington, D. C.

The subjects of saddling, biting, and draft, together with the study of the proper conformation of animals used for military purposes, are included in this set of lectures.

The control of animal epidemics in military life is also given special consideration.

VETERINARY JURISPRUDENCE

WILLIAM W. BRIDE, A.B., LL.B..*Lecturer on Veterinary Jurisprudence*

A series of lectures upon the Law of Animals, including suggestions relating to the conduct of veterinarians as experts in the trial of cases involving the above law.

In addition to the foregoing courses of lectures, a number of Government experts have been engaged to give lectures on subjects of special interest to the veterinarian.

These men are specialists in their lines of scientific research, and this is the only school giving such a course.

EXAMINATIONS AND DEGREE

Examinations are held at the end of the course in each subject. Students failing in examinations will be permitted to be re-examined at the next regular examination period. Students will not be admitted to examination unless they have paid all fees due at the time or present a permit signed by the Dean. In order to avail themselves of the privilege of re-examination, students must file their written applications with the Dean not later than fifteen days before the date set for the examinations.

Proficiency is marked upon a scale of 100. A grade of 70 is required to pass an examination.

If a satisfactory examination is passed, the student receives the Degree of Doctor of Veterinary Medicine (D.V.M.)

THE VETERINARY LIBRARY

This library is located in the Administration Building of the College of Veterinary Medicine, and is open from 8 a. m. to 10 p. m.

It contains, in addition to volumes on veterinary medical subjects, the current veterinary journals.

Provision is made in the annual library fee charged every student to add to it as published, the important new works on veterinary medicine.

OTHER LIBRARIES

Washington contains the Library of the Surgeon General's Office of the United States Army, the most complete medical library in the world. This library, as all other libraries of the Government, is open to the public between the hours of 9 a. m. and 4:30 p. m. There is also the Library of Congress and the many excellent libraries of the various other Government offices, in addition to the University Medical Library.

FEES AND CONTINGENT EXPENSES

1. Matriculation fee (payable only on first entry into the University).....	\$5
2. Library fee per annum.....	2
3. Tuition fee per annum.....	100
4. Fee for graduation.....	10

A deposit of \$5 per annum is required of every student to cover loss, breakage, or damage to the property of the school. The amount of such deposit paid in excess of the breakage will be returned.

No change will be made in the fees fixed at registration except in case of withdrawal, and then only upon notice in due form, and from the end of the current quarter-session, when such withdrawal shall be approved. Applications for the granting of a withdrawal should be made on the prescribed form to be obtained from the Registrar, and will be received only at the end of a quarter-session.

Students are urged to purchase their own microscopes, but those who do not care to do so may rent them from the University at the following rates:

Microscope for Histological Laboratory use.....	\$3
Microscope for Bacteriological, Pathological, and Clinical Micro- scopy Laboratory use.....	\$5

PAYMENT OF FEES

All fees are to be paid to the clerk. Tuition fees are payable quarterly, in advance. Matriculation, library, and laboratory fees are payable in full, in advance.

STUDENT EMPLOYMENT

The College of Veterinary Medicine will aid students, especially those coming from a distance, to obtain suitable employment as a means of defraying a part or all of their expenses while in pursuit of their college course. Opportunities for such employment in Washington are exceptionally good. The many Departments of Government, the Library of Congress, Congressmen's secretaryships, law offices, contractors' and architects' offices, night schools, journalism, stenography, etc., offer a large number of positions of the most diverse kinds. While the College must not be understood as in any sense engaging to find employment for prospective students, in a great many cases important assistance can be rendered duly qualified applicants, if the fact of their desire to obtain employment is known. Applicants are particularly cautioned against coming to the University, intending to depend upon outside employment for support, without being provided with funds sufficient to meet the expenses of at least the first half-year. Communications should be addressed to

THE DEAN

*The George Washington University
College of Veterinary Medicine*

THE GEORGE WASHINGTON UNIVERSITY

BOARD AND ROOMS

A register of approved boarding-houses is kept by the clerk. Accommodations cost from \$25 to \$40 a month.

For further information apply to

DAVID E. BUCKINGHAM, Dean

The George Washington University
College of Veterinary Medicine

Nos. 2113-2115 Fourteenth St. N. W. Washington, D. C.

STUDENTS

DOCTOR OF VETERINARY MEDICINE

First Year

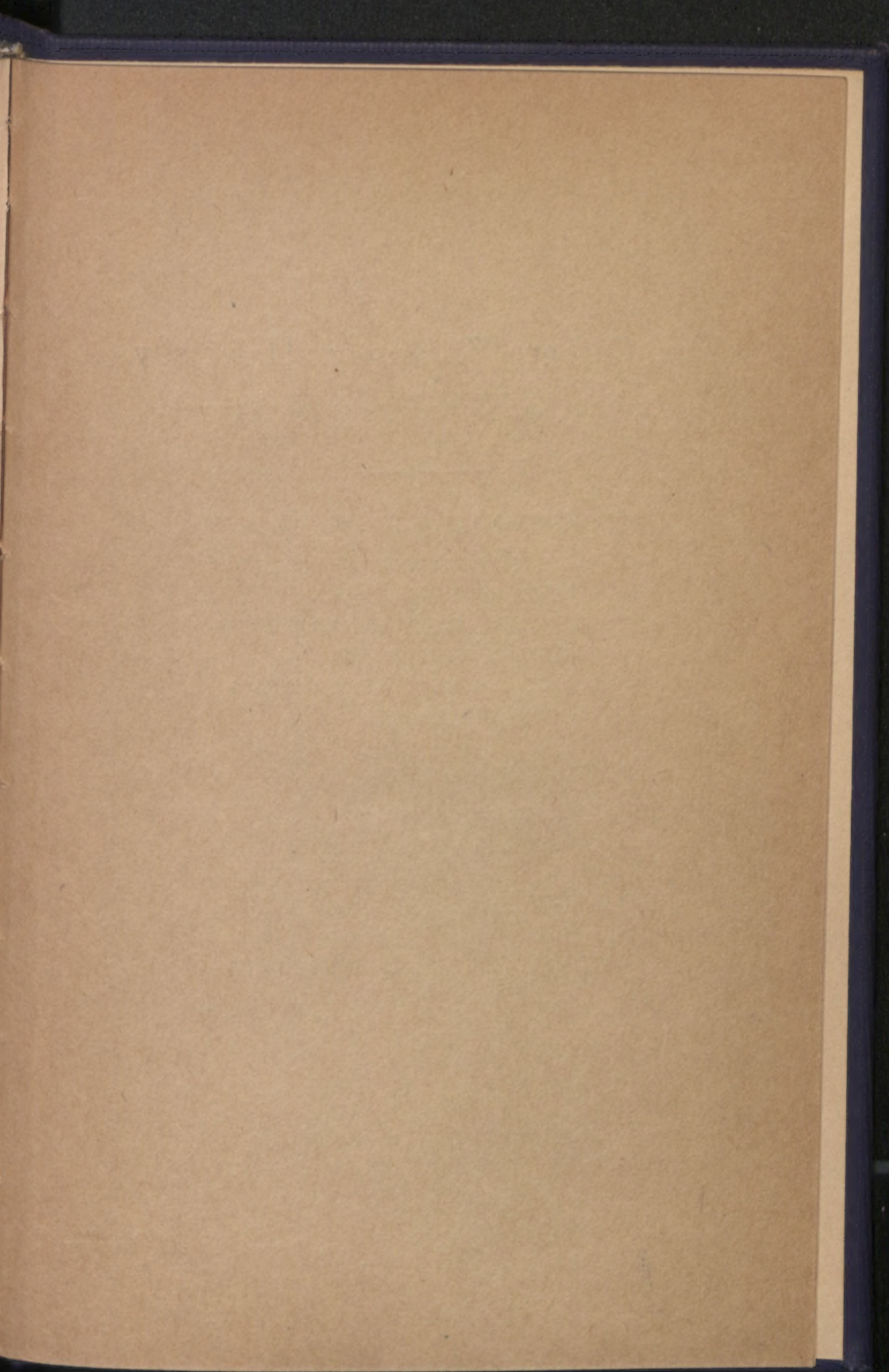
Name	Legal residence	City address
Ayers, A. T.....	D. C.....	P. M. G. Dept., War Dept.
Benjamin, F. H.....	D. C.....	204, Y. M. C. A.
Buchanan, J. Wesley.....	D. C.....	502 M Street.
Clayton, H. T.....	Mo.....	U. S. Treasury.
Earl, W. B.....	D. C.....	Navy Dept.
Fake, C. T.....	N. Y.....	1732 Twenty-first St. N. W.
Hammer, Orrin O.....	Va.....	Alexandria, Va.
Hodge, J. E.....	D. C.....	225 H Street N. W.
Holt, C. L.....	Tex.....	Room 259, War Dept.
Lochboehler, H. A.....	Nebr.....	414 R Street N. W.
Marsh, Hadleigh.....	D. C.....	3430 Brown Street.
Morcock, J. E.....	Ga.....	23 Q Street N. E.
McClure, F. I.....	Pa.....	1332 W Street N. W.
McClure, F. K.....	Pa.....	1332 W Street N. W.
Perrin, Edwin R.....	Mich.....	1322 W Street N. W.
Smith, Jesse K.....	Ariz.....	U. S. Treasury.
Stahl, B. M.....	D. C.....	1108 North Capitol Street.

Second Year

Name	Legal residence	City address
Brett, George Wesley.....	Mass.....	2117 O Street N. W.
Chamberlain, J. F.....	Mass.....	
Cotton, William E.....	Iowa.....	3242 Thirty-eighth St. N. W.
Dillard, William E.....	Va.....	Agricultural Dpt.
Divine, John P.....	Ark.....	1463 Florida Avenue N. W.
Fry, William H.....	D. C.....	608 North Carolina Avenue.
Franz, J. Louis.....	Wis.....	Y. M. C. A.
Graybill, Harry W.....	Iowa.....	1828 Fifteenth Street N. W.
Graham, Charles R.....	Pa.....	1826 Ninth Street N. W.
Grubb, Chauncy R.....	Md.....	2320 Ontario Road.
Hornbaker, Joseph N.....	Va.....	1415 Monroe Street N. W.
Hugins, Frank A.....	Mass.....	1355 Spring Road N. W.
Hicks, Tunis.....	Mich.....	621 1/2 Park Road.

THE GEORGE WASHINGTON UNIVERSITY

Name	Legal residence	City address
Hicks, Greydon St. C.....	Mich.....	621½ Park Road.
Humphrey, Charles W.....	Pa.....	327 Pennsylvania Ave. S. E.
Koon, George H.....	Ohio.....	2320 Ontario Road.
Kushner, Albert.....	Md.....	2115 Fourteenth Street N. W.
Lowry, William B.....	D. C.....	1827 Sixth Street N. W.
Miller, E. W.....	Va.....	1330 W Street N. W.
Moore, Charles S.....	Mich.....	2323 University Place N. W.
Maher, William A.....	Va.....	220 Twelfth Street S. E.
McCarthy, Henry J.....	Md.....	304 H Street N. W.
O'Hara, William H.....	Wis.....	2414 North Capitol Street.
Plunkert, Charles M.....	D. C.....	435 O Street N. W.
Riley, Edward H.....	Okla.....	B. A. I., Agricultural Dept.
Shore, Howard J.....	N. C.....	B. A. I., Agricultural Dept.
Smith, R. Hamilton.....	D. C.....	1735 Willard Street.
White, George E.....	Mass.....	323 East Capitol Street.



The George Washington University
College of Veterinary Medicine

DEPARTMENT OF ARTS AND SCIENCES

FACULTY OF GRADUATE STUDIES

COLUMBIAN COLLEGE

WASHINGTON COLLEGE OF ENGINEERING

DIVISION OF ARCHITECTURE

COLLEGE OF THE POLITICAL SCIENCES

DIVISION OF EDUCATION

FACULTY OF MEDICINE

DEPARTMENT OF MEDICINE

DEPARTMENT OF DENTISTRY

DEPARTMENT OF LAW

NATIONAL COLLEGE OF PHARMACY

